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스포츠 매니지먼트 석사 학위논문

The Relationship between High School  
Students' Sport Participation and Their  
Self-esteem, Subjective Well-being and  
Academic Achievement:

Focusing on Bangladesh

고등학생들의 스포츠 참여와 그들의 자존감, 주관적  
행복, 학업 성취도와의 관계:  
방글라데시를 중심으로

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## **Abstract**

# **The Relationship Between High School Students' Sport Participation and Their Self-esteem, Subjective Well-being and Academic Achievement:**

**Focusing on Bangladesh.**

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Sport participation contributes in increasing the Self-esteem, Subjective wellbeing(SWB) and academic result of students. Specifically, regular sport participation can play a big role for the development of students in highly populated city like Dhaka, Bangladesh. But to increase the sport participation of students in the Dhaka city or in the country students especially high school students and their parents need to know about the benefit of it. Knowing about the contribution of sport participation

on young students' Self-esteem, SWB and Academic results will motivate the students, their parents and policy makers to improve the sport facilities in future in Dhaka city. This study examines the relationship between high school students Sport participation and their Self-esteem, SWB and Academic achievement in Dhaka, Bangladesh. A survey questionnaire was used to collect the data about high school students' level of Sport participation, Self-esteem, SWB and Academic results. Data was collected from three hundred high school students (N=300) of Dhaka city. The primary result about the participation of sport shows that big number of high school students are not participating in sports. Almost 50% of the participants of the study were found either not participating in sports at all or participating 1-2 days of a week. Other student respondents were participating in sports specially on cricket and football, two famous sports of the country. Following the depth analysis, this study found that sport participation has positive relation with the increase of high school students' Self-esteem, SWB and Academic result in Dhaka. The conclusion can also be drawn that with the increase of sport participation, high school students' Self-esteem, SWB and Academic result also improve.

**Keywords** : Sport participation, High school student, Self-esteem,  
Subjective wellbeing, Academic achievement

**Student Number:** 2015-22357

## **Abbreviations**

GPA	Grade Point Average.
GSOEP	German Social Economic Panel.
HSC	Higher Secondary Certificate.
SPSS	Statistical Package for the Social Science.
SSC	Secondary School Certificate.
SWB	Subjective Well-being.
UCLA	University of California, Los Angeles.
UK	United Kingdom.
UN	United Nations.
UNESCO	United Nations Educational, Scientific and Cultural Organization.
USA	United States of America.
WHO	World Health Organization.

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# **Chapter 1. Introduction**

## **1.1. Background**

Sport participation has been considered as part of recreational activities in many countries for decades. This concept has changed when scholars from various corner of the world came out with the sport participation nexus with health, media, and other well-being of human life and society. Besides, present sport business structure also input lot of importance on studies related to sport participation. It is universally believed that sport participation has various impacts on human life. Various researches all around the world have already proved that by their studies. Donaldson & Ronan (2006) stated that, exercise and sports participation have been established as an important factor in reducing the risk of many types of physical problems of human life such as cardiovascular diseases, high blood pressure and obesity etc. Beside these, exercise and sport participation also enhance psychological and emotional well-being of human being.

Perkins and his colleagues (2004) conducted a detail study about sport participation impact on human and the study showed the importance of sport participation for all level of aged people. But childhood participation

habit is very much significant. This study in USA was conducted to examine the relation between sports participation during childhood and adolescence with the physical fitness activities on adulthood. More than 600 respondents of three groups (age 12, age 17, and age 25) from the Michigan were taken as data population for the study. The study result identified that, childhood and adolescent sport participation was proved to be an important and significant predictor of adult sport and physical fitness activities (p. 495-520). From another study of Sallis (1990) it is stated that, to develop and increase the amount of sport participation it is very important and mandatory to begin this participation during childhood. Educational institute are the integral part of a human being during this childhood stage. Therefore, sports participation of students at this stage will be one of the milestone factor of ensuring overall sport participation of any society. Availability of sport facilities in educational institutes and residential areas for this young students have got significance role to ensure this step. A facility-rich environment could encourage physical activity in various ways. Availability of sport facilities close to one's home will always draw one's attention towards sports. People in and around the facility who appear to be exercisers may strengthen the impact of the stimulus by making sport participation to be the social norm. Thus, facilities can provide numerous role models for

physical exercise and sports. Nearby facilities also reduce some of the barriers associated with sport participation or exercise. For example, travel time and traffic related stresses to reach up to sport facilities are reduced. Anybody can walk to nearby facilities easily. Thus, physical proximity could reduce psychological and physical barriers to sport participation (p. 179).

Recently ‘Sport for Development’ is well discussed issue around the world. Developed countries are using this concept to change their active lifestyle, youth development, social development, health benefits etc. Same way developing and under developed countries are also considered to be benefited out of this sport participation concept in various level. This study will specifically focus on Bangladesh. South Asian country Bangladesh is one of the developing countries of the world now. Though the country is small in size but at present it contains 8<sup>th</sup> highest population of the world. Recently country’s population have crossed more than 160 million (UN Department of Economic and Social Affairs Population Division, 2015). Studying sport participation impacts on general population of Bangladesh will be worth enough just because of its population size. Like many other issues within the country, sport participation for all was never considered as a big or important issue in this country. But people’s behavior towards



sports tell the different story. General population are very much fond of sports. However, until now no significant initiative was taken from the government side or private entities to promote sport participation as a tool of life development. Even not a single research was conducted to identify the importance of sport participation of general population. Mass population of the country are also not aware about the necessity of sports participation. Recently ministry of education of Government of People's Republic of Bangladesh included 'Physical Education' as a mandatory subject in high school curriculum. But still the subject is neglected and considered as an unnecessary and less important subject comparing with other academic subjects.

Sport participation is also recognized as a fundamental right for all by UNESCO. But the picture in Dhaka is different. Maximum population of Dhaka, the capital city is not getting this opportunity to fulfill the right of sport participation due to less sport facilities. At present, many reputed schools, colleges of the country are located in Dhaka and a smart amount of students are studying here. But maximum institutes located here are failed to provide sport facilities for their students. Though some institutes provide sport facilities but that is not sufficient for all the students of that particular institutes. It is obvious that, these students need to participate in sport

regularly. Unfortunately, the impacts of sport participation on students were also never taken into consideration. Even students' parents are not still concern about it. Beside this, another big obstacle for sport participation named unplanned urbanization is still continued without creating adequate sport facilities in the city. All these factors have made the urgency to identify the negative impacts of less sport participation of students due to less sport facilities in Dhaka at present. In depth study on this issue and the probable outcome result and recommendations will show some guidelines to formulate remarkable changes on policy makers mind to improve the current situation in the country. This will also bring some awareness among the parents staying at Dhaka about the sport participation of their children.

Dhaka, the capital of Bangladesh is one of the densely populated city of the country. Not only in the country but also in the world, Dhaka is the mostly populated city. Approximately 16 million people with a density of 112,700 people are accommodated here (UN World Population Day Report, 2015). Sport facilities available in the city are never sufficient for these huge population. Unplanned urbanization of the city leads to this sport facility problem. But this less sport participation due to less facilities problem is not highlighted much to government as because of their continuous dealing with other major basic problems of Dhaka city. But a huge amount of next

generation population staying in the city especially students are not able to participate in sports activities due to this facility crisis. They are facing the negative impacts of not participating in sports without much notice.

## **1.2. Statement of the Problem**

Several studies proved that individuals who participate in sports have comparatively higher self-esteem than nonparticipants do. For example, most adolescent girls who were involved in sports had much higher self-esteem than the nonparticipants (Butcher, 1989). An individual can always get adequate life skills, self-confidence from sport participation, which are very important elements in this competitive world. Students having these qualities are more likely to get success in their academic or real life.

Normally parents always want their children to be succeed. No acceptance in case of the parents of Dhaka. However, most of them are not concerned about the impacts or benefits of sports participation and its relation with their children's success or moral factors in life. That is why sport participation of all children is not ensured in Dhaka or Bangladesh, not by the parents or by the policy makers from the government. Besides, sport facilities for the students as well as other children at Dhaka are very less due to unplanned urbanization. Children sport participant number in Dhaka is less now and not sufficient. No specific research or study is conducted in the

field of sports participation and its impacts on students or children in Bangladesh yet. Recently, extreme use of electronic devices like mobile, computer, video games etc. are taking place of their active sport during leisure periods. This is leading them towards more inactive life. Before it's too late, it is very important to find out the impacts of sport participation on school going children and show it to the society.

### **1.3. Research Purpose and Research Question**

Importance of youth sport participation is widely recognized by many countries of the world. Sport participation has very much significance for the overall development of the young generation of any nation. It is much more important and applicable for highly populated country like Bangladesh. To ensure the sport participation for all by the government of Bangladesh, engaging high school students in sports will be the first and giant step. This will also clarify that, sport participation leads to increase self-esteem, subjective well-being and academic achievements for the students. But the importance of children's sport participation and bad impacts of less participation are not projected to the mass population and especially to the parents of the students in Bangladesh. If this importance is not recognized and brought out in front now in that case sport facilities will not be ensured by the government and sport participation problems will

remain. Besides, students' parents of Dhaka city will never realize the importance of sport participation of their children. This simple study will help to identify relation of sport participation with self-esteem, subjective well-being, academic results of high school students to show the importance of sport participation to the respondents (students of high school of Dhaka), their parents and also to the society. Keeping these aspects and the importance of high school students sport participation in mind following research topic is selected.

“The relationship between high school students' Sport participation and their Self-esteem, Subjective well-being and Academic achievement: Focusing on Bangladesh.”

To achieve the purpose, three research questions are developed as follows:

1. What are the weekly sport participation patterns of high school students at Dhaka, Bangladesh?
2. Does high school students' Sport participation have any relation with high school students' 'Self-esteem' and 'Subjective well-being' at Dhaka, Bangladesh?

3. Does high school Sport participation have any relation with high school students' Academic achievement (i.e. examination results) in Dhaka, Bangladesh?

#### **1.4. Significance of the Study**

General population of Bangladesh shows positive views about sport participation. Passion about cricket all around the country proves their love and concern about sport. Like others young generation especially students of the country are also interested in sports. They want to participate in sports. But cities like Dhaka are developing without any kind of planning around the country. No specific plan for keeping sport facilities are there in urban development planning. And it creates the big barrier in sport participation for all. Even maximum schools of Dhaka are not equipped with sports facilities. Facilities available in schools as well as Dhaka city are not allowing them to participate physically in sports. Another point of concern is that, parents are also not interested to send their children in sports because of less secured sport facilities to send their kids and less awareness. Even in many cases, parent's knowledge about the benefits of regular sport participation by their children is questioned. This academic study will be very significant in the following ways:

This study will be helpful to identify the importance of sport participation for all high school students in Dhaka where huge amount of high school students is not aware about it.

This study will find out the positive factors of sport participation and negative factors of non-participation by the high school students, which was never researched before in Bangladesh.

Based on the study result or findings of the study, it would be possible to improve the present sport facilities in schools and colleges of Dhaka as well as other fast growing cities of Bangladesh.

This study result may change the parental attitude towards sport participation thus children participation in sports will increase in Dhaka or in Bangladesh as a whole.

And this study will act as eye opener of the policy makers of the country and lead to change the social behavior towards sport participation.

Considering these facts, it is very much crystal clear that, this study will be significant one to change the trend of sport participation of high school students of Dhaka city as well as in Bangladesh. Overall standard of sports of the country will also increase with the time passes.

### **1.5. Definition of Terms**

In order to clear understanding of the nature and scope of the study, mentioned terms should be understood as follows:

#### 1.5.1. Self-esteem

The Cambridge dictionary defined ‘Self-esteem’ as ‘belief and confidence in your own ability and value.’ Self-esteem is also essentially considered as an aesthetic or valuative phenomenon. It can be understood according to the difference between instrumental and intrinsic value (Dewey1939). Tofarodi and Swam Jr (2001) mentioned that, instrumental value refers to what an object is good for and what good it can do. And intrinsic value refers to some specific qualities of any object those are considered good in themselves. While applied to the persons, duality is reflected in personal competence, on the one hand, and appearance, character and the social identity of the other. Individuals take on value both by merit what they can do and what they appear to be. Mostly, this is often expressed as the distinction between ‘respect’ and ‘liking’. The former is founded on observable abilities, skills and talents, the later on moral character, attractiveness and other aspects of social worth. These two types of value however, are not independent, for abilities are often viewed as virtues and virtues are often used to great effect. Despite this overlap, the



distinction is worth maintaining for the purpose of clarifying the compound nature of self-esteem.

In general, self-esteem is how we as an individual value ourselves; it is how we perceive our value to the world and how valuable we think we are to others. Self-esteem affects our trust in one-another, our relationships, our work - nearly every parts of our lives. Positive self-esteem always provides the strength and flexibility to take charge of our lives and grow from our mistakes without the fear of rejection. Confidence, self-direction, non-blaming behavior, an awareness of personal strengths, ability to make mistakes and learn from them, ability to accept mistakes of others, optimism, ability to solve problems, an independent and cooperative attitude, feeling comfortable with a wide range of emotions, ability to trust others, good sense of personal limitations, good self-care etc. are the example of positive self-esteem. On the other hand, negative view of life, perfectionist attitude, mistrusting others - even those who show signs of affection, blaming behavior, fear of taking risks, feelings of being unloved and unlovable, dependence-letting others make decisions, fear of being ridiculed etc. are the great example of low self-esteem.

### 1.5.2. Subjective well-being (SWB)

Subjective well-being (SWB) has been always seen as a critical indicator of successful aging (Rowe & Kahn, 1987). Veenhoven describes the subjective well-being as the degree to which an individual normally judges the overall quality of one's life as a whole in a favorable way (Diener, 1994). Andrews and Robinson (1991) defined this SWB as "a psychological summing up of the quality of an individual's life in a society" (p. 61), and Diener et al. (1999) stress that "subjective well-being is a broad category of phenomena that includes people's emotional responses (pleasant–unpleasant affects), domain satisfactions, and global judgements of life satisfaction" (p. 277). SWB is therefore can be explained as a phenomenological, global expression by any individual of the quality of one's state of existence.

SWB is also defined as 'a person's cognitive and affective evaluations of his or her own life' (Diener 2002, p. 63). The cognitive element refers to what an individual think about his or her life satisfaction in global terms (life as a whole) and in domain terms (in specific areas of life such as work, relationships, etc.). The affective element refers to emotions, moods and feelings. Affect is considered positive when the emotions, moods and feelings experienced are pleasant (e.g. joy, elation, affection etc.)

Affect is deemed negative, when the emotions, moods and feelings experienced are unpleasant (e.g. guilt, anger, shame etc.).

An individual who has a high level of satisfaction with their life, and who experiences a greater positive affect and little or less negative affect, would be deemed to have a high level of SWB (or in simpler terms, be very happy). The concept of SWB falls within the 'hedonic' perspective that defines well-being or happiness as being fundamentally about maximizing pleasure and avoiding or minimizing pain.

When psychologists measure SWB, they are measuring how people think and feel about their lives. The three components of SWB, life satisfaction, positive affect and negative affect, are independent factors that should be measured and studied separately (Andrews & Withey, 1976 and Lucas et al., 1996). Personality is often considered to be one of the strongest and most consistent predictors of SWB. Explanations and support for the relationship between personality and SWB comes from a number of research studies and theories.

### 1.5.3. Academic achievement

The definition of academic achievement varies among educators, policymakers and other educational stakeholders. However, academic achievement refers to a student's success in meeting short- or long-term

goals in education. In the big picture, academic achievement means successful completing of high school or earning a college degree. In a given semester, high academic achievement may mean a student is on the honor roll. Academic achievement can be influenced by a variety of factors. These include simple demographic factors, such as age, gender and family socioeconomic status to more variable factors like the quality of the teaching faculty at a student's school and the way that students with special needs are grouped together etc. For example, in some cases, students of a certain gender or race may have a statistically better chance of academic success than their peers of a different gender or race. Additionally, home environment, including parental financial status and the amount of support and stability offered at home, can have a big impact on how students perform in school.

Academic result or grade in examination at school of high school students of Dhaka will be considered as the academic achievement for this particular study.

#### 1.5.4. High School Students

Ministry of Education (Development of Bangladesh, National Report of Bangladesh, September 2004) is the highest authority to explain and policy determining body for the education system of Bangladesh.

Education of Bangladesh has three major stages. This includes primary, secondary and higher education. Primary education is a five years cycle from grade one to five and secondary education is seven years cycle from grade six to twelve, which is also divided into three stages. These divisions are, junior secondary (grade six, seven and eight), secondary (grade nine and ten), higher secondary (grade eleven and twelve). Third and final stage is higher education or graduation stage. The entry age for primary level is six years. In average eleven years to seventeen years is the age of secondary education period.

In case of this study, students from grade six to grade ten, that means first two stages students of secondary level will be considered as high school students. Moreover, their age limit will be considered as within eleven years to fifteen years.

## **Chapter 2. Literature Review**

### **2.1. Introduction**

The amount of studies and researches conducted by the scholars in the field of sport participation nexus with human benefits are not enough comparing with other studies. However, recently this amount is increasing worldwide. Conducted studies till now around various countries of the globe provide practical evidences about sport participation impacts. Cameron & MacDougall (2000) stated that, sport participation and physical activity can play a significant role in contemporary society. Participation in sport and physical activity has great meaning for the participant group of people. During sports activities a group of people of a society come together around team activities such as volleyball, football, and cricket. Sport participation and physical activities have the potential to improve the total quality of life. In the 19th century, Thomas Arnold included sport as central and compulsory part of the education curriculum for boys in England. His vision and hope was that moral education could be imparted, and as a form of “character building”. At the same time, women were also pushing and asking for the same educational and athletic opportunities as men. In the late 19th century and early 20th century, a movement developed professional

training for women in gymnastics, considering its remedial, educational, and aesthetic value. The idea that sport is moral education has been discredited. Nevertheless, it is worth exploring the idea that participation in sport and physical activity is important if young people are to fully participate in society. In mass participation for many ordinary people, sport and physical activity is pure fun, or a fantasy that allows one to escape from day-to-day reality of family conflicts, hopelessness, homelessness, or the temptations to use alcohol, drugs, or inhale petrol. By donning a sport uniform, young people can be equal, regardless of their diverse backgrounds. Sport participation and physical activity can provide people a sense of belonging, loyalty and support, which may mean that suicide, truancy, and illicit drug use is no longer viewed as an option. The experiences young people get from involvement in sport activities are physical activity, fitness, and skill development etc. Beside, sport is also a matter of enjoyment of play and a form of social integration. Participation in sport and physical activity can have long-term benefits in the social development of young people. Sport participation may also have some immediate outcomes- police and communities may witness an immediate benefit that coincides with the duration of the sporting or physical activity. Due to sport participation and physical activity levels of assault, malicious damage, receiving or selling

drug goods, shoplifting goods, theft etc. may drop. The benefits of participation in sport and physical activity vary from one social setting to another.

Green (2008) stated that, sport has the great power to foster social changes. Social change is defined as shifts in social phenomena at various levels, ranging from the individual or personal level to that of society as a whole. Although social change can be either positive or negative. Perceptions of sport participation as a tool for positive social and personal change are grounded in the belief that sport is an effective and positive socializing agent. Sport participation is commonly believed to develop positive character traits, to assist young people to become better citizens and more successful adults, to reduce delinquency rates and risky behaviors, to assist with moral development including a sense of fair play, and to instill a strong achievement orientation. In short, sport is expected to teach basic rules of social behavior and to inculcate fundamental societal values such as hard work, competitiveness, and sacrifice. Although there is general popular agreement about the values of sport participation as a tool for socialization, there is not always general agreement about what it is that sport provides. Parents from different social classes agreed that sport participation taught important values to their children. But they disagreed about what those



values are. Working class parents felt that sport participation teaches teamwork and obedience to authority. While parents in white collar occupations felt in differently. Their vision was that sport teaches individual achievements and leadership (p. 129-147).

A century of literature documents has tried to find out the effects of sport and physical activity on social and human behavior. Together with the obvious physiological benefits, sport has been shown as an important element to improve emotional and cognitive skills, which include self-esteem and problem-solving (Collis & Griffin 1993). Makkai & Willis K. (2003) mentioned that, these skills improvements have the power to influence directly on human behavioral factors. Sport may be a useful intervention strategy for all in reducing antisocial behavior. Two key important aspects of sport participation and physical activity are:

- Sport participation and physical activities always reduce feelings of boredom among the young guys; and
- Sport participation and physical activities normally decrease the amount of unsupervised leisure time.

Preventing and reducing boredom is very much important during this young age due to its reported direct links to depression, distractibility and loneliness (Coalter et al. 2000). In addition, there is consensus that if youth

lack stimulation and have little to do they will seek their own, often antisocial and negative activities.

## **2.2. Sport Participation and Self-esteem**

Adolescence is a time of transition when an individual normally struggles to deal with the physical, cognitive, and social changes throughout this developmental period. These changes of life can be stressful in many cases, and may lead to significant declines in feelings of self-worth.

Adolescents may experience a decline in general satisfaction with the self or they may experience a decline in specific sub domains of the self, such as, physical appearance, athletic competence or academic competence (Harter, 1985; Marsh, 1987). One area of self-esteem that may be most affected during the period of adolescent is physical self-esteem. Or the extent up to which one feels satisfied with one's physical self. Physical self-esteem can include both feelings of physical attractiveness, as well as perceived physical competence (Fox, 1997). Feeling positively about one's physical self is an important predictor of overall or general self-esteem during adolescence (Harter, 1997), particularly more applicable for the adolescent girls. Physical self-esteem can be particularly sensitive to variations in physical activity level. Research does suggest that children and adolescents who normally participate in sports regularly report higher levels of self-

esteem, particularly in the physical domain (Bowker & Findlay, 2005). Moreover, while sports participation may enhance feelings about one's physical self (e.g., I can run fast, I can play better etc.) may have a more indirect relationship with overall feelings of well-being or general self-esteem. This participating in sports activities may increase feelings of physical competence and satisfaction with physical appearance, which in turn increases general self-esteem (Jackson & Marsh, 1986). Depending on different participation rates of boys and girls, and given the fact that sports is still viewed by many as a "masculine domain," the impact of sports participation on general self-esteem may well vary by sex.

*"Sports do not build character. They reveal it."*

- John Wooden, UCLA Head Basketball Coach.

Karve R. (2015) stated that, the character development process of any individual through sport can be systematic or non-systematic. It involves both formal and informal processes. Organized sport character education can provide powerful results for the teaching and learning of good moral habits. These powerful character tools can have a positive or negative impact on students. Organized sport provides favorable conditions for positive psychosocial development (Larson, 2000). Sport has also been associated with the development of life skills (Goudas et al. 2006;

Papacharisis & Theodorakis, 2005). The World Health Organization (WHO) defines life skills as the ability for adaptive and positive behavior that enables individuals to deal effectively with the demands and challenges of everyday life (WHO:1999).

In 2006, Rod K. Dishman and his colleagues examined whether physical self-concept and self-esteem would mediate cross-sectional relations of physical activity and sport participation with depression symptoms among 1,250 girls in 12th grade. They found very strong positive relation between global physical self-concept and self-esteem and a moderate inverse relation between self-esteem and depression symptoms. Physical activity and sport participation each had indirect, positive relation with physical self-concept that was independent of objective measures of cardio respiratory fitness and body fatness. These results of this relation with physical activity, sport participation provide initial evidence suggesting that physical activity and sport participation might reduce depression risk among adolescent girls by unique, positive influences on physical self-concept that operate independently of fitness, body mass index, and perceptions of sports competence, body fat, and appearance.

Sportsmanship and the development of positive character are the important goals of school sports. It is believed that sport programs have the

promoting power to develop sportsmanlike behaviors, ethical decision-making skills, and a total curriculum for moral character development (Stoll, 1995, p. 335) and sports provide a social environment to learn personal and social values and behaviors contributing to good character and good citizenship (Arnold, 1984). The sport can provide one of the greatest opportunities for students to learn honesty, integrity and ethical behaviors or it can provide "one of the greatest opportunities in school for a youngster to learn how to be dishonest or how to be hypocritical" (Sabock, 1985, p. 271). Many existing researches support that mere participation sports itself leads to the development of moral character. The opposite appears too as exception. Some researchers found that, sport participation may be more likely to negatively affect moral character (Bredemeier, 1984; Priest & Beach, 1999; Stoll & Beller, 2000). But it is mentionable that whether positive or negative, "sports have immense power to shape consciousness, values, and beliefs of athletes and to pass on selected aspects of the dominant culture" (Sage, 1998, p. 264).

### **2.3. Sport Participation and Subjective well-being (SWB)**

There are many growing evidences demonstrating that, exercise and sport participation can be effective in improving the SWB of the general public, youth and students largely through improved mood and self-

perceptions. A study on the happiest college students showed that those found to engage in large amounts of physical and social activity were the happiest (Diener & Seligman, 2002). Consistent with the conclusions from this study was the experiment conducted by Fleeson (2002) where both extroverted and introverted college students were asked to record their activities and moods over a period of 3 weeks in a diary. The results showed that both groups were happiest when engaged in 'extroverted' activities.

The ability of physical activity and sport participation to 'energise' and produce more positive mood is reported widely. Stephens (1988) summarized epidemiological evidence that showed the association between physical activity and several indices of subjective well-being. Biddle SJH has conducted a review of reviews on the literature and concluded with the followings:

- Large scale surveys conducted in several countries using different types of methods and criteria confirm the moderate association or relation between physical activity and indices of SWB.
- Experimental studies in this field support a positive effect on human mood for moderate intensity exercise.
- Affective benefits are more likely to be experienced when participants focus on personal improvement goals.

Brajsa-Zganec (2011) stated that, the quality of life is normally determined with objective factors and subjective perception of factors which influence a human life. Individual leisure activities of human being play a very important role in SWB. Because these activities provide opportunities to meet life values and needs of human life. Through participation in leisure activities like sports, an individual build social relationships, feel strong and positive emotions, acquire good skills and knowledge, and therefore improve their quality of life.

Many published studies have previously investigated the impact of sports participation on SWB. Tim Pawloski et al. (2011) on their study on ‘Subjective well-being in European countries- on the age-specific impact of physical activity’ compiled some studies related to sport participation impact on SWB.

Table 1. Studies on the impact of sport participation on SWB (in chronological order)

Author	Country	Data	Estimator	Central Findings
Becchetti et al.	Germany	German Social Economic Panel (GSOEP)	Ordinary least squares (OLS) and fixed effects (FE)	Relational goods, including sports participation individually and collectively increases life satisfaction
Lechner	Germany	German Social Economic Panel	Matching estimator	Significant effects of sport participation upon SWB of males are identified but positive

		(GSOEP)		and insignificant effects for females
Rasciute and Downward	UK	UK Taking Part Survey	Bivariate and ordered probit, seemingly unrelated regression (SUR)	Sports participation and walking have a positive effect on both the individual's health and happiness. Cycling also appears to involve some negative impact on happiness, which could be the disutility associated with traffic congestion
Downward and Rasciute	UK	UK Taking Part Survey	Heterogeneous threshold ordered probit estimator	Sports participation increases SWB generally, but more so in the context of social interactions (team sports and sports undertaken with a partner)
Lee and Park	Korea	Primary data	Ordered probit, ordered logit and OLS	Controlling for six different types of physical disability it is shown that sports participation raises the probability of higher levels of SWB

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(Source: Tim Pawloski et al. (2011) 'Subjective well-being in European countries-on the age-specific impact of physical activity', European Review of Aging and Physical Activity 2011, Published: 22 July 2011.)

A significant contribution of these studies is that they make use of information on facilities to help control for the indigeneity between participation in sport and SWB. They also find positive effects of sports participation on SWB.



#### **2.4. Sport Participation and Students' Academic Achievements**

Donnelly & Coakley (2007) stated that, there is a significant amount of evidence to show that sport-based programs improve the learning performance of children and youth, facilitating educational attainment and encouraging them to stay in school. And that sport-based programs in school aid in the social development of young students. This relationship can be explained in different ways. In the most basic way, sport participation at a young age helps children to learn physical skills and that physical skills allow them to stay active later in life. The educational benefits are often thought of more broadly. Children may learn, or become familiar with, the competitive process and learn to assess their competence in different skills through sport participation (p. 24-26).

Sport participation and academic performance has correlation and this correlation is well established by many researches around the world. Research studies have consistently clarified that sport participation is beneficial to students. Cousins (2004) stated that, the Role of Sports in Youth Development, Carnegie Corporation, New York, in a report of a meeting in March 1996 found that, evidence proved that the involvement of young people in sports results multiple benefits for them. At their best, sports programs promote responsible social behaviors and greater academic

success, self-confidence, an appreciation of personal health and fitness, and strong family and social bonds. Teachers attribute these results to the discipline and work ethic that sports require. Department of Health and Human Services of USA conducted a study named “Adolescent Time Use, Risky Behavior, and Outcomes: An Analysis of National Data”, issued in September 1995. They found that students who spend no time in extracurricular activities like sports are 57% more likely to have dropped out from school by the time they would have been seniors; 49% more likely to have used drugs; 37% more likely to have become teen parents; 35% more likely to have smoking habit; and 27% more likely to have been arrested than those who spend one to four hours per week in extracurricular activities. Another research conducted in 1991 by Skip Dane of Hardiness revealed the following about participation in high school sports: 1) By a 2-to-1 ratio, boys who participate in sports do perform better in school, do not drop out and have a better chance to get through college. 2) The ratio for girls who participate in sports and do well in school is three to one. 3) About 92% of sports participants do not use drugs. 4) School athletes are more self-assured. 5) Sports participants take average and above average classes. 6) Sports participants receive above-average grades and do above average on skills tests. 7) Those involved in sports have knowledge of and use

financial aid and have a chance to finish college. 8) Student-athletes appear to have more parental involvement than other students. 9) Students involved in athletics appear to change focus from cars and money to life accomplishments during the process (p. 23-25).

In Australia, a research on 'Academic Performance, Physical Activity and Fitness in Children' was done by Dwyer et al. (2001) and the study was on 7,961 Australian schoolchildren (7-15 year olds) using a questionnaire/fitness test for measurement of physical activity/physical fitness and a 5-point scale to depict academic performance. The questionnaire was administered by trained data collectors to four students at a time to ensure the questions were understood properly and the respondents' responses were as accurate as possible. Questions asked information on the students' involvement in sport including frequency, time, and intensity in the past week. Additionally, information in reference to the subjects' mode of transportation to and from school and activities during morning recess and lunch breaks was taken. The fitness test was administered by a trained team and consisted of indoor and outdoor tests. Each student's academic performance was measured via 5- point scale. This indicated excellent, above average, average, below average, or poor ratings administered by a school representative, most often the principal. Information regarding

school size and physical activity programs were also noted on a school questionnaire. After the analysis of results, Dwyer concluded that, “consistently across age and sex groups, the (academic) ratings were significantly correlated with questionnaire measures of physical activity and with performance on the 1.6 kilometer run, sit-ups, and push-ups challenges, 50-meter sprint, and standing long jump” (p. 225-237).

## **2.5. Socio Economic Status and Self-esteem, SWB and Students’ Academic Achievements**

Socio economic status is always considered as one of the most identical and impactful factor of any persons’ self-esteem and SWB. Some researchers also found close relation of parents Socio economic status with students’ academic achievement. Twenge (2002) conducted a research where he showed that, Socio economic status has significant and close relationship with self-esteem of any individual. He discovered that, higher Socio economic status individual reports higher self-esteem. The effect size was small in young children, increases substantially during young adulthood, the relationship between Socio economic status and self-esteem continues higher until middle age, and was then smaller for adult individuals over the age of 60. CH Lan (2004) examined a model how Socio economic status is related with adolescents' self-esteem. Structural equation of this study

showed that occupational prestige and Socio economic status make unique contributions to adolescents' academic achievement and self-esteem.

Socio economic status have strong relationship with any individual's SWB. Researches in the field of Socio economic status and SWB relationship discovered dynamic and significant results. Nettle (2005), in his study found that Socio-economic status is highly associated with any persons' increasing levels of subjective well-being. In that study, Socio-economic status impacts on subjective well-being were investigated in a large cross-section of the British population. Higher Socio economic status groups were more satisfied with their life and had fewer psychosomatic symptoms. They also had higher levels of perceived personal control of their own lives. Dost MT (2006) examined the existing relationship of SWB to gender, Socio economic status, perceived parental attitudes, satisfaction with physical appearance, religious belief among the university students. The study participants were 700 university students of Hacettepe University, Ankara, Turkey during the year of 2002-2003. The study demonstrated significant differences in the SWB level of the students according to their parents' Socio economic status level and perceived attitude of parents. Tong, Song (2004) examined the characteristics of general self-efficacy and SWB and their relations in college students from low Socio economic status in

China. 102 students from low Socio economic status families and 164 regular college students were examined in this study. Study result showed that, students from low Socio economic status families scored significantly lower than their peers on general self-efficacy and SWB. This research outcome indicated that, Socio economic status of students' families had an important effect on general self-efficacy and SWB of students.

Parents' Socio economic status has great and significant relation with the students' academic achievements. Although it is widely believed that, Socio economic status is correlated with measures of students' academic achievement, weak and moderate both type of correlations is frequently reported. Using meta-analysis techniques, almost 200 studies that considered the relation between Socio economic status and academic achievement were examined by White KR (1982). Results of that particular study indicated that, as Socio economic status is typically defined (income, education, and/or occupation of household heads) and typically used (individuals as the unit of analysis), Socio economic status is only weakly correlated ( $r = .22$ ) with academic achievement. With further aggregated units of analysis, typically obtained correlations between Socio economic status and academic achievement jump to .73. Family characteristics, such as home atmosphere, sometimes incorrectly referred to as Socio economic

status, are substantially correlated with academic achievement when individuals are the unit of analysis ( $r = .55$ ). Okpala et al. (2001) conducted a research about the influences of parental involvement and Socio economic status of parents on students' mathematics achievement scores of Grade 4 students in a low-income county in North Carolina. One of the result of the study showed that, Socio economic circumstances of parents were correlated with academic achievement.

### **Chapter 3. Methodology**

The purpose of this study is to explore the impacts of sport participation on high school students of highly populated city Dhaka, Bangladesh where sport facilities are very less for mass population due to unplanned urbanization. More specifically this study will focus on sport participation and its relation with students' self-esteem, SWB and academic achievement. Literature review has highlighted the various kinds of benefits or impacts that can be achieved from sport participation. Besides, Socio economic factor was also discussed in relation with Self-esteem, SWB and academic achievement in Literature Review chapter of the study because of its close and identical relation with these factors. This study will try to find out the similar impacts of sport participation on high school students in Dhaka by using the different methods. A research methodology is defined as “By methods we mean that range of approaches used in educational research to gather data which we are to be used as a basis for inference and interpretation, for explanation and prediction” (Cohen 2003). In methodology chapter of this study, explanation about the research approaches towards the research and method for data collection and method to analyze of the data will be discussed. Later in this chapter, the details about the participants and measurement scales used in the research will be



discussed. In order to achieve the objectives of the study several methods will be applied for this particular research.

### **3.1. Research Design**

Research is a detail process of enquiry and investigation on a specific topic; it is systematic, methodical and ethical; research can help to solve practical problems and increase knowledge. Again, research is just not collecting the information, “Research requires the collection and interpretation of data in an attempt to resolve the problem that initiated the research” (Leedy & Ormrod 2013). And “A research design is a logical plan for getting from here to there, where here may be defined as the initial set of questions to be answered, and there is some set of conclusions about these questions” (Yin 1994). Qualitative and quantitative methods are the two specified ways to collect the data which depends on the research questions and the type of the research. The researcher chooses one of the methods for research and mixed approach can also be chosen to collect the data. Normally in mixed approach both qualitative and quantitative methods are used to collect the data. “Distinguish between qualitative and quantitative data in term of the difference between meanings and numbers, Qualitative data deals with meaning, whereas quantitative data deals with numbers” (Dey, 2003).

For this particular study quantitative research methodology will be used. Following figure shows detail about the research approach and continuous development of the study:

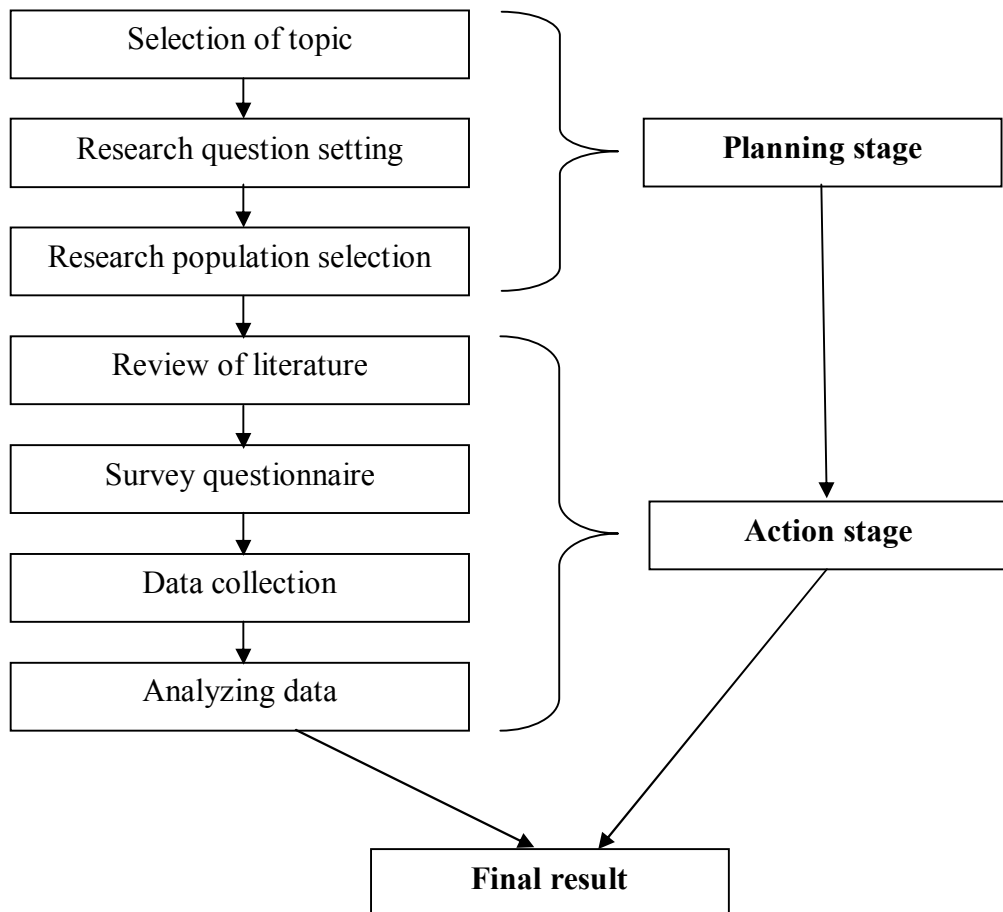


Figure 1. Study design flowchart

Quantitative research involves looking at amounts, numbers or quantities, of one or more variables of interest. Quantitative research mostly

starts with a specific hypothesis and then theories are built to test that hypothesis. The purpose of the quantitative research is to find the explanation and predictions that will generalize among other persons and places. The intention is to establish, confirm, or validate relationship and to develop generalizations that contribute to existing theories. Quantitative research identifies one or a few variables that they intend to study and then collect data specifically related to those variables. These data can be collected from various field surveys, numeric data etc.

### **3.2. Data Collection**

For this study, data was collected from the students of high school of Dhaka, Bangladesh. Survey questionnaires were prepared by the researcher to collect the accurate data related to the analysis from the high school student respondents of this study, high school students of Dhaka (from grade six to grade ten). Data collection process focused on collecting the data which explains high school students' sports participation pattern, status of their self-esteem, SWB, Academic results and their Socio economic status. To relate the academic achievement of student respondents with sport participation the result of half yearly examination of 2016 was considered. It's because, this examination was held just before the data collection. Another important issue which was considered for the study was, Socio

economic status of respondents' family and parents. Socio economic status has got great influence on any individual's self-esteem and SWB. In this case, Socio economic status of students' family or parents may have influences on their self-esteem and SWB. To analyze and minimize that, researcher also collected the data related to students' family and parents academic background and Socio economic status. Students from same Socio economic background were considered to identify the actual relations among the variables.

For the better understanding of the survey questionnaire by the student respondents the survey questionnaires were translated into Bengali language from English. Back translation of the Bengali language of the questionnaires was done with the help of the specialist to confirm the accuracy of the translation. This helped the student respondents to understand the survey questions more easily.

### **3.3. Participants of the Study**

The subject of this particular study were selected from one of the high school of Dhaka city named Tejgaon Government High School, Dhaka. Tejgaon Government High School, Dhaka was established in 1935 and its one of the oldest school in Dhaka. It situated at Tejturi Bazaar (Near

Farmgate) which was located at the center of Dhaka. Basic considerations for selecting this particular school were:

- a. Well reputed school of Dhaka city.
- b. This school was consisting of handsome amount of students.
- c. Students were coming from all around the city because of the location of the school.
- d. Socio economic status of the students' families or parents were almost same in this school. Maximum of the student respondents were from middle class family background.

Information or data was collected from total number of three hundred male students (from grade six to grade ten) of the school. Female students were not considered for this study. The reason behind is that, sport participation of girls in the country was very less. And in case of Dhaka it was more less. So responses from female students of high school of Dhaka might manipulate the results of the study.

### **3.4. Measures**

For this study Rosenberg Self-esteem Scale (1965) was applied to calculate the Self-esteem of the students. Rosenberg Self-esteem Scale is a 10-item scale that is used to measure the global self-worth by measuring both positive and negative feelings about the self. The scale is universally

believed to be unidimensional. All items or questions in this scale are answered using a 4-point Likert scale format ranging from strongly agree to strongly disagree. The Rosenberg Self-Esteem Scale is a widely used self-report instrument for evaluating individual self-esteem, was investigated using item response theory. Factor analysis identified a single common factor, contrary to some previous studies that extracted separate Self-Confidence and Self-Depreciation factors. A unidimensional model for graded item responses was fit to the data. A model that constrained the 10 items to equal discrimination was contrasted with a model allowing the discriminations to be estimated freely. The test of significance indicated that the unconstrained model better fit the data-that is, the 10 items of the Rosenberg Self-Esteem Scale are not equally discriminating and are differentially related to self-esteem.

For analyzing the SWB of the student respondents Hadley Cantril's Self-Anchoring Striving Scale (1966) was applied in this study. The scale describes one's life satisfaction with the imagination of a ladder with steps marked from zero at the bottom to ten at the top of the ladder. The top of the ladder represents the best possible life for the student respondents and the bottom of the ladder represents the worst possible life for the student respondents. Here the respondents mark himself on which step of the ladder

he or she personally feel standing at the time of collecting data.

Beside these, several questionnaires were asked in the survey to identify the sport participation patterns of the respondents. Academic result of the student respondents was asked to the respondents and result was reconfirmed from the school administration by the researcher for this study. Student parents' Socio economic status was also considered and collected from the student respondents through questionnaires.

### **3.5. Data Analysis**

The data was collected and analyzed in terms of relationships among variables in the study. As indicated earlier, the independent variable here in this study was sport participation of high school students of Dhaka, Bangladesh. This independent variable sport participation was also divided into two parts. These are Weekly participation and Total length of participation (for how long individual was participating sport). Time spent during any sport participation was considered to identify the sport participation pattern of the respondents. To identify the pattern of weekly sport participation of student respondents, descriptive statistics analyzing method (Mean(M), Median, Frequency, Standard Deviation(SD), Variance etc.) were used. The dependent variables for the study were the factors of Self-esteem, SWB and Academic achievement based on student

performance on half yearly examination 2016; Grade Point average (GPA). Both correlation analysis and regression analysis techniques were used to determine the relationship between variables. The use of correlational statistics through analysis of variance and multiple regression allowed for the independent variable to correlate the relationship to the criterion referenced dependent variable. In the whole process of analyzing while analyzing the dependent variable sport participation with dependent variables (Self-esteem, SWB, Academic achievement) researcher considered Sport participation in two ways. First; Weekly sport participation and Second; Total length of sport participation (Total period of time individual was participating). Pearson Correlation Coefficient ( $r$ ) were analyzed at the first step of analyzing to identify the correlation between variables. If the correlation of the analysis showed positive relation between the dependent and independent variables, then the regression analysis was conducted in order to identify the impacts. Reliability test of Self-esteem data was analyzed using Cronbach alpha test. Controlling Socio economic status were analyzed through Hierarchical multiple regression analysis. The entire analysis process of the data was obtained through the SPSS package of statistical design and research version 23.0 data analyzing software.



## **Chapter 4. Results**

For this particular study researcher had distributed 325 survey questionnaires among the student respondents of Dhaka city. After completion of the survey 314 questionnaires were collected from the student respondents. However, among those responses 300 questionnaires will be used and analyzed as because some respondents failed to answer full questions. For the survey, researcher provided 28 questions to the respondents which included 5 questions for identifying their sport participation pattern, 10 questions to identify their self-esteem (Rosenberg Self-esteem Scale), single question to identify their SWB (Cantril's Self-Anchoring Striving Scale), 1 question about their academic result and 11 questions for their general information like age, class/grade, and Socio economic status etc. Respondents or participants of the study were the high school students of Dhaka. All the respondents were from grade six to grade ten. Total three hundred male student respondents were considered and selected by random selection method for this study. Student respondents were from Tejgaon government High School, Dhaka. This high school was located at the middle of the Dhaka city and both male and female students were studying here separately in two shifts. Table 2 shows the distribution of student respondents of this study as per their class or grade.

Table 2. Distribution of the participants (student respondents) as per grade or class of their study.

Class or Grade	Total (n=300)	Percentage (%)
Six	84	28
Seven	61	20
Eight	48	16
Nine	63	21
Ten	44	14

Secondary education in Bangladesh consists of grade six to grade ten. From Table 2 it was found that, in this survey maximum participants (28%) were from grade six and the least number of participants (14%) were from grade ten. From grade seven 20%, from grade eight 16% and from nine 21% student had participated in this research.

#### 4.1. Descriptive Statistics

In order to identify the relations of variables data was collected through survey questionnaire. Beside the data of independent and dependent variables researcher had collected some data related to respondents' demographics which were important for this study. For example, age, type of family, parents' education background, parents' occupation, Socio economic status of their family etc. These data were important for this study because some of these like Socio economic status might have strong influences on the dependent variables such as Self-esteem and SWB of the

student respondents. These data were analyzed by descriptive statistics. The independent and dependent variables of this study were also analyzed by the descriptive statistics.

#### 4.1.1. Demographics of participants

Average age of the student respondents of the study were around ten to sixteen years old. Among the respondents 34.33% respondents were from the age of 15 to 16, 37.33% were from the age from 13 to 14 and 28.33% respondents were from 11 to 12 years old. Figure 2 shows the ratio of the age categories of the student respondents.

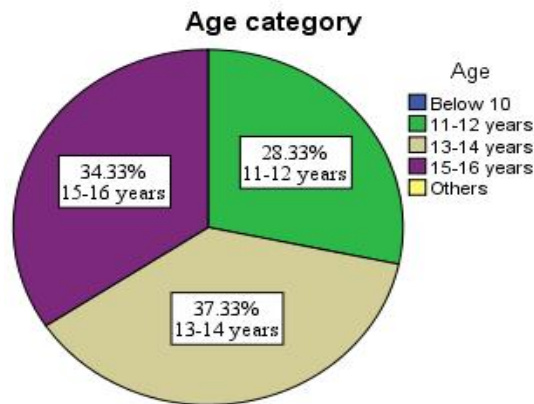


Figure 2. Age category of student respondents

No respondents were found below the age of 10 and more than the age of 16. Everybody was within the age limit of 11-16 years. From Figure 2 it was clear that almost equal number of student respondents were there in

three categories.

Type of family from where students belonged was very much important for this study and also it is very important for any individual in Bangladeshi culture. Mainly two types of family are considered by the people of the country. One is the ‘nuclear family’ where father, mother, brother and sister are staying together and other category is ‘combined family’ which is consist of father, mother, brothers, sisters, grandparents and others. Among the student respondents, around 85% reported that they were from the nuclear family and around 15% respondents were from combined family. Figure 3 below shows the family type of the student respondents.

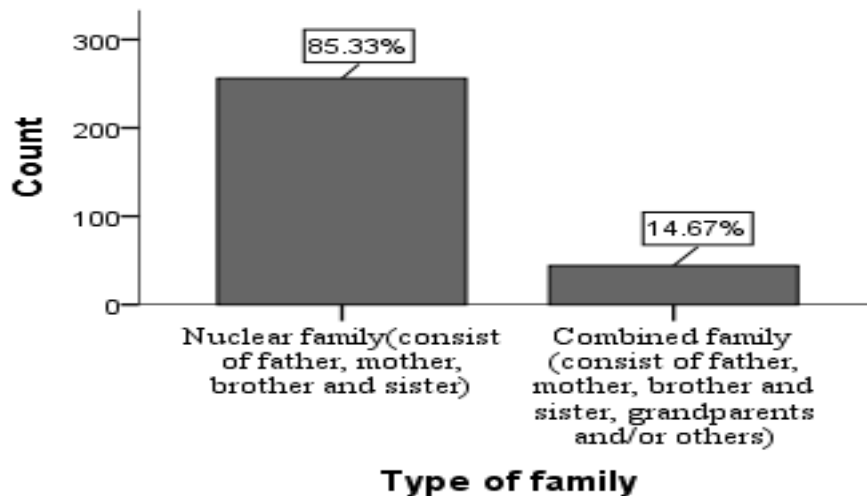


Figure 3. Family type of the student respondents.

This result also indicates the common picture about characteristics of

the families of Dhaka city. Majority of them are nuclear family and maximum participants of the study were from the nuclear family.

In case of parents' education background student respondents reported that, 32% of respondents' fathers were from graduation background, 31% fathers' educational background were Higher Secondary Certificate (HSC), 26% were from Secondary School Certificate (SSC) background and 11% respondents' fathers were reported that they did not have any education. In cases of respondents' mothers' education background, only around 18.7% of respondents' mothers had completed their graduation, 30.3% of respondents' mother's education background were HSC, 35% of them were from SSC background and 16% of respondents' mothers did not have any education background.

Table 3. Comparative statistics of student respondents' parents education background.

Education status	Graduation		HSC		SSC		No education	
	Count	Percentage (%)	Count	Percentage (%)	Count	Percentage (%)	Count	Percentage (%)
Education of father	96	32%	93	31%	78	26%	33	11%
Education of mother	56	18.7%	91	30.3%	105	35%	48	16%

Table 3 here shows the difference between the education background

of student respondents' fathers and mothers. Here, in case of all the educational stages, father's education background was comparatively higher than the mothers' education background. But overall education background of both fathers and mothers were low in the context of the country. As 75% of the fathers and 81.3% of the mothers of the participants were from below graduation level of academic background and whining those some were even without any education background.

Parents occupation was one of the important factor for the student respondents of the study because of its relation with the Socio economic status. Following Table 4 describes the occupation status of student respondents' parents.

Table 4. Descriptive statistics of student respondents' parents' occupation.

Occupation	Government service		Private service		Business		Unemployed		Others	
	Count	Percentage (%)	Count	Percentage (%)	Count	Percentage (%)	Count	Percentage (%)	Count	Percentage (%)
Occupation of father	64	21.3%	79	26.3%	143	47.7%	2	0.7%	12	4%
Occupation of mother	12	4%	7	2.3%	4	1.3%	277	92.3%	0	0%

Based on the responses of the student respondents regarding their fathers' occupation it was found that, 21.3% of them were from government

service, 26.3% of them were employed in various private service, 47.7% were involved in various types of business, 0.7% of them were unemployed and 4% percent were involved in other professions. But in case of respondents' mothers' occupation it was found that almost maximum respondents' mothers were housewives and they were unemployed. 92.3% of student respondents' mothers were found as unemployed. They were only working as housewives. Exceptionally only 4% of the mothers were in government service, 2.3% were doing private jobs and other 1.3% were involved in some kind of business.

Socio economic status of the student respondents' family were very important for this study. Because, economic status might have strong chance to be related with the variables like Sport participation, SWB and Self-esteem. Sometimes it also had relation with the Academic achievement of students. Reviewed literatures for this study also showed the impacts of Socio economic status with these variables. From the survey data it was found that maximum of the respondents' families was in the state of middle class. Less than one percent (0.33%) student respondents were from upper socio economic class family and 2% student respondents were from lower socio economic class. 72.67% student respondents were from middle class family, 12% of the student respondents were from upper middle class and

13% of the student respondents were from lower middle class family.

Following Figure 4 explains the distribution of student respondents as per their Socio economic status.

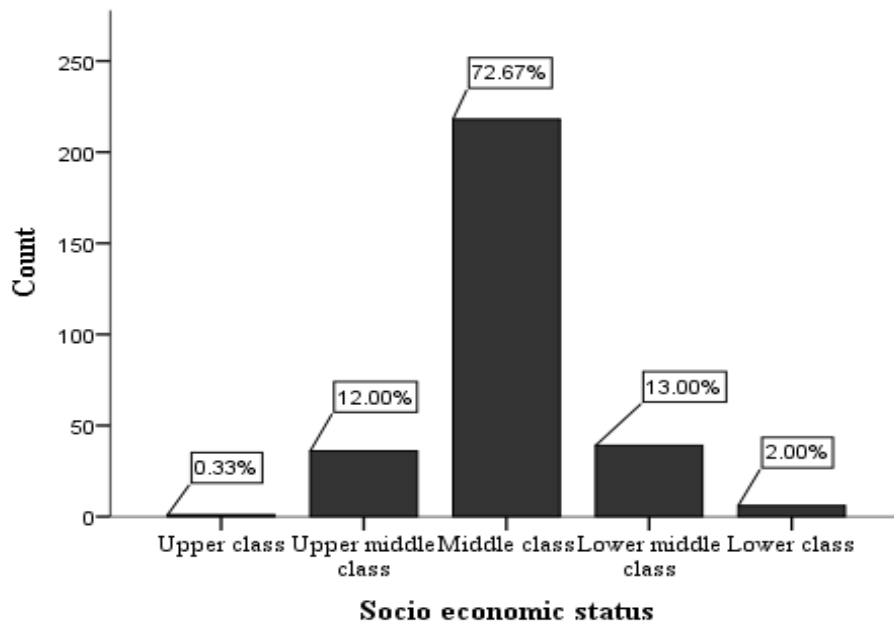


Figure 4. Socio economic status of student respondents' families participated in the study.

Study data and bar graph (Figure 4) here clearly showed that, majority of participant student respondents in this study were from middle class family.



#### 4.1.2 Variables

##### a. Sport Participation

The dependent variable for this study was Sport participation.

Researcher had distributed and collected the sports participation data into three categories. These were a. Weekly sport participation by the respondents, b. Time spent by the respondent during sport participation, c. Total length of sport participation. These three types of data describe the general pattern of sport participation by the high school student respondents. Researcher also collected the data about the type of sports respondent generally participated. Type of sports were categorized into two types; Team sport and Individual sport. Sports normally played by group of people for example Football, Cricket, Hockey etc. were considered as 'Team sport' and sports which can be played alone for example Chess, Athletics, Squash etc. were considered as 'Individual sport' by the researcher. From the study data it was found that, 90.70% of the student respondents were participating in Team sport. And only 9.30% of them were participating in Individual sport. Figure 5 represent the difference clearly about the type of sports student respondents were participating.

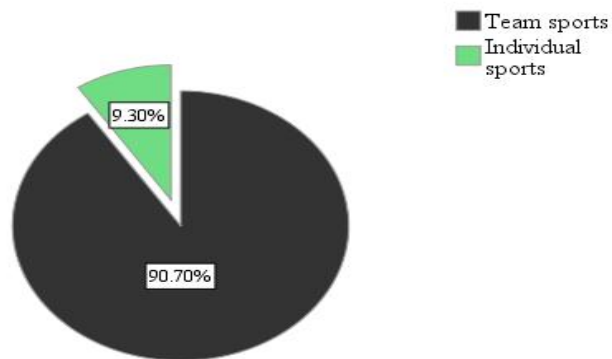


Figure 5. Types of sports participated by respondents.

Beside this, respondents had mentioned about the name of sports they were participating. Figure 6 shows the distribution of sports student respondents were participating.

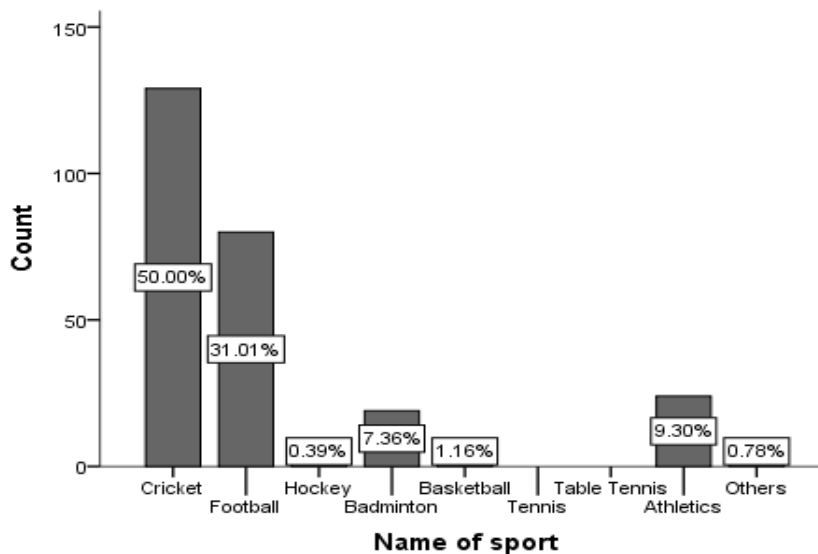


Figure 6. Name of sport participated by the student respondents.

Cricket and Football are the most popular sports in the country.

Study data also shows that more than 80% of the student respondents were playing these two sports. 50% of the respondents were participating in Cricket, 31.01% were participating in Football. Participation at other sports were very less compare to these two popular sports. Study data showed that, only 9.30% were playing Athletics, 7.36% were playing Badminton, 1.16% were playing Basketball, 0.39 were playing Hockey and 0.78% were playing some other sports. Nobody was found playing Tennis or Table Tennis from the participants.

Study data showed here that student respondents were intended to participate more on Team sport in compare with Individual sport. For Dhaka city these were Cricket and Football mostly. Participation in other sports by the students were very less.

In order to identify the Weekly sport participation of the student respondents, researcher divided the participation into 5 categories. These were a. Don't participate at all, b. 1-2 days, c. 3-4 days, d. 5-6 days and e. 7 days. From the analysis it was found that, highest number of 95 respondents replied that they were participating in sports 1-2 days of a week which was 31.7% of the total 300 respondents(N=300). Table 5 describes about the statistics of sport participation as per the categories.

Table 5. Descriptive statistic of respondents' Weekly sport participation

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Don't participate at all	42	14.0	14.0	14.0
	1-2 days	95	31.7	31.7	45.7
	3-4 days	86	28.7	28.7	74.3
	5-6 days	51	17.0	17.0	91.3
	7 days	26	8.7	8.7	100.0
	Total	300	100.0	100.0	

As per Table 5, among others 86 respondents (28.7%) were participating 3-4 days of a week, 51 respondents (17%) were participating 5-6 days of a week and 26 respondents (8.7%) were participating each 7 days of a week. However, 42 students (14% of total respondents) reported that they didn't participate in sport at all.

In order to identify the time spent by the student respondents during any sport participation, student respondents were given with 5 options by the researcher. These were a. Less than 30 minutes, b. More than 30 minutes but less than 1 hour, c. More than 1 hour but less than 1.5 hour, d. More than 1.5 hour but less than 2 hours and e. More than 2 hours. It was found that, total 42 student respondents (14%) were not participating in sport at all from all respondents (N=300). Distribution of other 86% student respondents as per their daily time spent during sport participation is shown

in Figure 7. Maximum 37.98% respondents were spending more than 1.5 hour but less than 2 hours when they were participating in sports. 27.13% respondents were spending more than 1 hour but less than 1.5 hour, 12.40% were spending more than 30 minutes but less than 1 hour, 5.81% were spending less than 30-minute time. Only 16.67% were playing more than 2 hours during their sport participation.

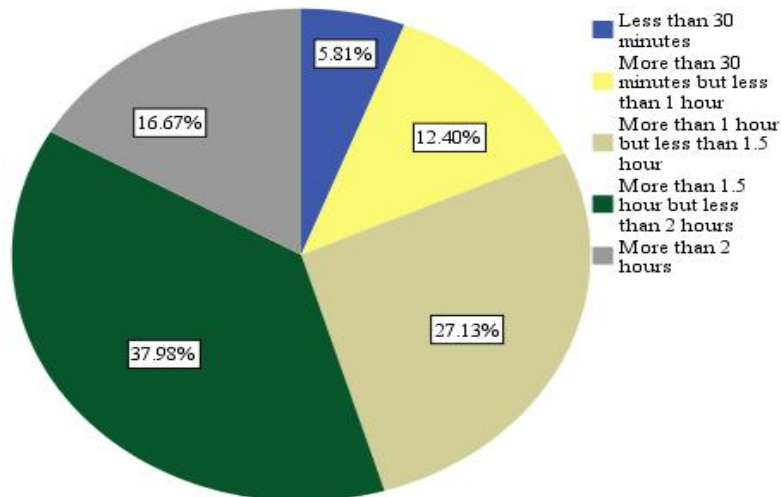


Figure 7. Time spent during sport participation.

To identify the participation pattern of the student respondents, researcher also took the data about how long they were participating in sport. The questionnaire for collecting this time period was categorized into 7 parts from minimum category last 1-2 months to maximum category of more than 1 year. Table 6 below describes the total period of time student

respondents were participating in sport before data collection. Total 42 respondents (14% of total respondents) did not participate in sport at all (N=300). Other 86% were distributed in various categories dived by the researcher.

Table 6. Descriptive statistics of Total length of sport participation by the student respondents.

	Frequency	Percentage	Valid Percent	Cumulative Percent
Last 1-2 months	2	.7	.8	.8
Last 3-4 months	16	5.3	6.2	7
Last 5-6 months	32	10.7	12.4	19.4
Last 7-8 months	59	19.7	22.9	42.2
Last 9-10 months	55	18.3	21.3	63.6
Last 11-12 months	56	18.7	21.7	85.3
More than last 1 year	38	12.7	14.7	100
Total	258	86	100	
No response	42	14		
Total	300	100		

From Table 6 it was noticed that, maximum 59 student respondents (19.7% of the total respondents) were participating sport for last 7-8 months. 56 respondents (18.7%) were participating for last 11-12 months, 55 respondents (18.3%) were participating for last 9-10 months, 38 respondents (12.7%) were participating for more than last 1 year, 32 respondents (10.7%) were participating for last 5-6 months, 16 respondents (5.3%) were participating for last 3-4 months and only 2 respondents (.7%) were

participating for last 1-2 months. From the statistics it was noticed that, maximum number of the student respondents those were participating in sport were also continuing their participation for more than last 5-6 months.

b. Self-esteem

To determine one of the dependent variable of this study Self-esteem of the student respondents 'Rosenberg Self-Esteem Scale' was used by the researcher. Responses of the student respondents (N=300) were put in SPSS and sums of the total score obtained by the student respondents were computed by the software. Every score was counted out of the total score 40. As per the responses of the student respondents it was found that, from 300 respondents the mean score of Self-esteem was 27.26 ( $M=27.26$ ), median was 28, mode 29, standard deviation was 3.585 ( $SD=3.585$ ), variance was 12.854. The minimum score was 19 and maximum score was 38. Figure 8 shows the Self-esteem score of the student respondents in relation with the frequency.

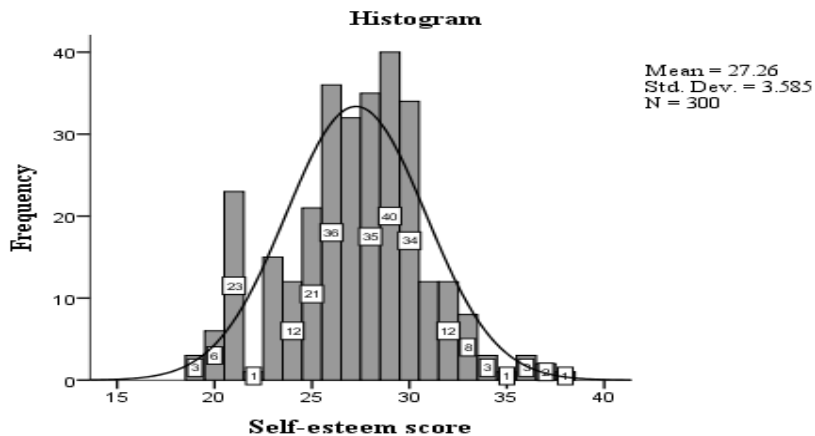


Figure 8. Histogram chart of Self-esteem score of the student respondents.

Self-esteem score 29 was achieved by maximum 40 respondents, 36 respondents had achieved score 26. Minimum score 19 was achieved by 3 respondents and maximum score 38 was achieved by only 1 respondent.

#### c. SWB of the participants

In order to find out the student respondents' SWB, researcher applied Hadley Cantril's Self-Anchoring Striving Scale (1966). This particular scale describes one's life satisfaction with imagination of a ladder with steps numbered from zero at the bottom to ten at the top. As per the collected data by the researcher it was found that, the mean SWB score of student respondents was 6.09. Maximum score obtained by the respondents was 10 and minimum score was 0. Mean and median was same (6) and the



standard deviation (SD) was 1.463. Table 7 shows the descriptive statistics of SWB score of student respondents.

Table 7. Descriptive statistics of SWB score of student respondents.

SWB score	Frequency	Percent	Valid Percent	Cumulative Percent
0	1	.3	.3	.3
2	2	.7	.7	1
3	10	3.3	3.3	4.3
4	22	7.3	7.3	11.7
5	60	20	20	31.7
6	91	30.3	30.3	62.
7	72	24	24	86
8	27	9	9	95
9	12	4	4	99
10	3	1	1	100
Total	300	100	100	

Table 7 shows that, SWB score 6 was obtained by the maximum number of 91 respondents (30.3% of the total respondents). Among others 72 respondents (24%) had marked 7 as their SWB score, 60 respondents (20%) had scored 6, 27 respondents (9%) had scored 8, 12 respondents (4%) had scored 9, 10 respondents (3.3%) had scored 3, 3 respondents (1%) had scored 10, 2 respondents (.7%) had scored 2 and only 1 respondent (.3%) had scored 0.

d. Grade of 2016 half yearly examination of the participants

To analyze the Academic achievement of student respondents and its relation with Sport participation researcher had collected the result/grade of

all the student respondents of 2016 half yearly examination from the school. Results were categorized as per the present grade system of high school of Bangladesh. These 7 categories were A+(80%-100%), A (70%-79%), A- (60%-69%), B (50%-59%), C (40%-49%), D (33%-39%) and F (0%-32%). Distributed results of the student respondents are shown in Figure 9.

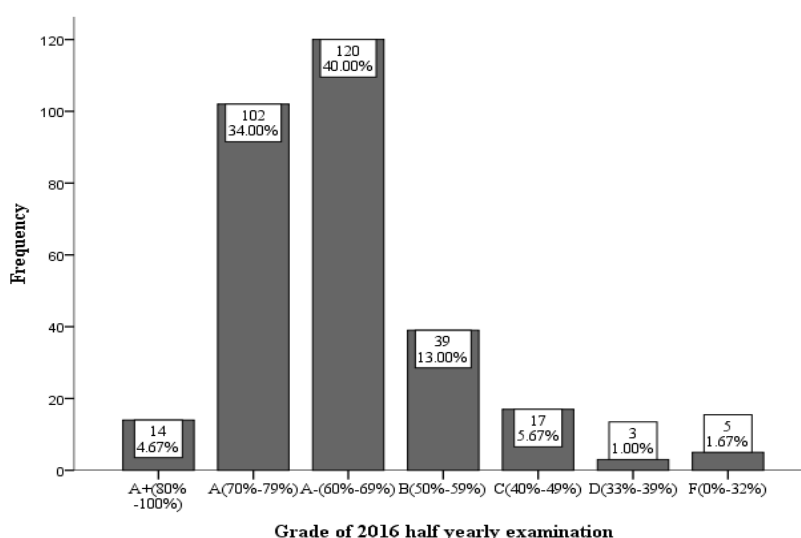


Figure 9. Bar chart of grade of the student respondents.

From the study data and Figure 9 it was found that, among the student respondents (N=300) grade A-(60%-69%) was achieved by the maximum number of 120 student respondents (40% of the total respondents). 102 respondents (34%) had achieved A (70%-79%), 39 respondents (13%) had achieved B (50%-59%), 17 respondents (5.6%) had achieved C (40%-49%), 3 respondents (1%) had achieved D (33%-39%)

and 5 respondents (1.67%) had achieved F (0%-32%). The highest grade A+( 80%-100%) was achieved by only 14 respondents (4.67%) of the total respondents.

#### **4.2. Reliability Test of Self-esteem data: Cronbach alpha**

Cronbach's alpha is used to measure of internal consistency, that is, how closely a set of items are related as a group. It is considered to be a measure of scale reliability. It should be noted that, a high value for Cronbach's alpha indicates a good internal consistency of the items in the scale. The closer Cronbach's alpha coefficient is to 1.0 the greater the internal consistency of the items in the Likert type scale. As per George and Mallery (2003) following are the thumb rules of Cronbach's alpha coefficient ( $\alpha$ ): a.  $\alpha > 0.90$  = Excellent, 0.80 - 0.89 = Good, 0.70 - 0.79 = Acceptable, 0.60 - 0.69 = Questionable, 0.50 - 0.59 = Poor and  $\alpha < 0.50$  = Unacceptable.

Researcher used The Rosenberg Self-Esteem Scale for this study. The Rosenberg Self-Esteem Scale had presented high ratings in reliability areas; from various test internal consistency was found 0.77, minimum Coefficient of Reproducibility was at least 0.90 (Rosenberg, 1965). A varied selection of independent studies each using such samples as-parents, men over 60, high school students, and civil servants-showed alpha coefficients

( $\alpha$ ) ranging from 0.72 to 0.87 (all fairly high). Test-retest reliability for the 2-week interval was calculated at 0.85, the 7-month interval was calculated at 0.63 (Silber & Tippett, 1965; Shorkey & Whiteman, 1978). For this particular study Cronbach's alpha was calculated by SPSS and the value was .749. Table 7 shows the value of Cronbach's alpha for this particular study data.

Table 8. Result for reliability test of Rosenberg self-esteem scale used in this study.

Cronbach's Alpha	Cronbach's Alpha Based on Standardized Items	N of Items
.749	.757	10

Rosenberg self-esteem scale data of this study showed that Cronbach alpha coefficient ( $\alpha$ ) value here was ranging from 0.70-0.79 which was very much acceptable.

#### **4.3. Relationship Between Respondents' Sport Participation and Other Dependent Variables**

In order to identify the relationship researcher had divided Sport participation of student respondents into two types. These were, First: Weekly sport participation and Second: Total length of sport participation. From previous descriptive analysis details were already discussed about these. The intention of dividing into two types of sport participation was to

identify more precise result about how Weekly participation was related with other dependent variables and again, how long duration participation in sports which was explained as Total length of sport participation had relations with dependent variables. Dependent variables for this study were student respondents Self-esteem, SWB and Academic achievement. Based on the existing Literature review and from the definitions of Self-esteem and SWB (Chapter 1) it was clear that these two are affected and influenced by many things in human life. For this particular study, based on the culture of the country of the study researcher identified that, Socio economic status of student respondents' family might have strong relation with Self-esteem and SWB of the respondents. Academic result also be influenced by it. From previous descriptive statistics it was found that, around 73% of the student respondents were from middle class family. Therefore, it's less likely to had strong relation of Socio economic status for this particular study with other dependent variables. But to identify any possibility, Socio economic status and its relationship with all three dependent variables Self-esteem, SWB, Grade of 2016 half yearly examination correlation was analyzed.

#### 4.3.1. Correlation analysis of Socio economic status with Self-esteem, SWB, Grade of examination

Following Table 9 describes the correlation of Socio economic status of student respondents and their Self-esteem, SWB and Grade of 2016 half yearly examination.

Table 9. Results of Correlation of Socio economic status with Self-esteem, SWB and Grade of 2016 half yearly examination.

Correlation Between Socio economic Status and Self-esteem			
Socio economic Status	Pearson Correlation	1	.015
	Sig. (2-tailed)		.797
	N	300	300
Self-esteem score	Pearson Correlation	.015	1
	Sig. (2-tailed)	.797	
	N	300	300
Correlation Between Socio economic Status and SWB			
Socio economic Status	Pearson Correlation	1	.165**
	Sig. (2-tailed)		.004
	N	300	300
SWB score	Pearson Correlation	.165**	1
	Sig. (2-tailed)	.004	
	N	300	300
Correlation Between Socio economic Status and Grade of 2016 half yearly examination			
Socio economic Status	Pearson Correlation	1	.079
	Sig. (2-tailed)		.173
	N	300	300
Grade of 2016 half yearly examination	Pearson Correlation	.079	1
	Sig. (2-tailed)	.173	
	N	300	300

\*\*Correlation is significant at the 0.01 level (2-tailed).

According to Table 9, 300 student respondents were surveyed about their Socio economic status ( $M=2.96$ ,  $SD=.585$ ) and their Self-esteem ( $M=27.26$ ,  $SD=3.585$ ), SWB ( $M=6.09$ ,  $SD=1.463$ ) and Grade of 2016 half yearly examination result ( $M=5.22$ ,  $SD=1.292$ ). From the Correlation between Socio economic status and Self-esteem, Pearson data analysis revealed a weak positive weak correlation  $r=.015$  in between Socio economic status and Self-esteem. Again the significance value here is  $P=.797$  which is much higher than  $.05$ . That means this correlation is not statistically significant.

Same type of result happened with the Correlation analysis of Socio economic status and Grade of 2016 half yearly examination. Here, Pearson analysis revealed weak positive correlation value which is  $r=.079$ . But, again the significance value  $P=.173$  which is also higher than  $.05$ . Therefore, this correlation is also not statistically significant.

But in case of the Correlation of Socio economic status and SWB, the result is different. Pearson data analysis revealed that Pearson correlation coefficient value here is  $r=.165$  which is also a weak positive correlation. But unlike other two Correlation, significance value here is  $.004$  means  $P=.004$  which is smaller than  $.05$ . This indicated that this association

between Socio economic status and SWB is positively significant at the 0.01 level (2-tailed).

#### 4.3.2. Controlling Socio economic status: Hierarchical Multiple Regression

Hierarchical multiple regression analysis was conducted to analyze the Socio economic status as one of the controlled independent variable of the study. Table 10 describes all the models of this multiple regression analysis. These models evaluate the assumption of contribution of Socio economic status for the study. From Model summary-1 table, where predictor independent variables are Socio economic status, Weekly Sport participation and Total length of participation and dependent variable is Self-esteem, it is found that,  $R^2=.000$ . It means Socio economic status accounts for 0% of the variability of the outcome of the model. Again, for block 2 of the same table, in case of the actual predictor variables Weekly sport participation, Total length of participation with Socio economic status  $R^2=.579$ . That means this model as a whole explain 57.9% of variability in Self-esteem of participants. Again from block 2 of the Model summary-1 it is found that, R square change value is .579 which means after the impact of Socio economic status is removed, other predictor variables Weekly sport participation and Total length of participation explain additional 57.9% even the Socio economic status is statistically controlled. And the P value for this



here is .000 and it is less than .05, which means this is statistically significant contribution for the study. But in case of block 1 the significance value  $P=.812$  which is much higher than the value .05. Which indicates that the impact of Socio economic status on Self-esteem is insignificant for this study.

Model summary-2 explain here the impacts of same predictors with another dependent variable SWB score of participants. In this model, for the first block, value of  $R^2=.027$ . This means Socio economic status accounts for 2.7% of the variability of the outcome here. And significance value  $P=.008$  which is less than .05 here indicates that, this is statistically significant contribution for the study. But again value of  $R^2=.412$  for block 2 of the model. This indicates that, in case of actual predictor independent variables Weekly sport participation and Total length of sport participation with Socio economic status the model explains 41.2% of the variability in SWB score. Again, changed R square value for block 2 here is .385 which means after the effect of Socio economic status has removed Weekly sport participation and Total length of sport participation can explain additional 38.5% of the variance in the outcome even the Socio economic status is statistically controlled. And the significance value  $P=.000$  confirms that the contribution is statistically significant for this study.

In Model summary-3 the predictors are the independent variables Weekly sport participation, Total length of sport participation and Socio economic status and the dependent variable is Grade of 2016 half yearly examination. For block 1, value of  $R^2=.006$  indicates that Socio economic status account for .06% of variability of the outcome. But, on the other hand, significance value  $P=.206$  which is much higher than .05. Therefore, Socio economic status model here is insignificant for this particular study. Again for block 2 here,  $R^2=.531$ , which means actual predictor variables Weekly sport participation and Total length of sport participation of this study with Socio economic status explain about 53.1% of the variability in Grade of 2016 half yearly examination. R square change value here is .529 which means after the effect of Socio economic status have been removed Weekly sport participation and Total length of participation explain 52.9% of the variance in the outcome even the Socio economic status is statistically controlled. And the significance value  $P=.000$  here proved that this model has significant statistical contribution for this study.

Table 10. Hierarchical Multiple Regression model.

Model summary <sup>c</sup> -1										
Model	R	R square	Adjusted R square	Std Error of the Estimate	Change statistics					
					R square change	F change	df1	df2	Sig. F change	
1	.015 <sup>a</sup>	.000	-.004	3.592	.000	.057	1	256	.812	
2	.761 <sup>b</sup>	.579	.575	2.339	.579	174.945	2	254	.000	
a. Predictors: (Constant), Socio economic status.										
b. Predictors: (Constant), Socio economic status, Total length of sport participation, Weekly sport participation.										
c. Dependent variable: Self-esteem score.										
Model summary <sup>c</sup> -2										
Model	R	R square	Adjusted R square	Std Error of the Estimate	Change statistics					
					R square change	F change	df1	df2	Sig. F change	
1	.165 <sup>a</sup>	.027	.023	1.446	.027	7.125	1	256	.008	
2	.642 <sup>b</sup>	.412	.405	1.128	.385	83.135	2	254	.000	
a. Predictors: (Constant), Socio economic status.										
b. Predictors: (Constant), Socio economic status, Total length of sport participation, Weekly sport participation.										
c. Dependent variable: SWB score.										
Model summary <sup>c</sup> -3										
Model	R	R square	Adjusted R square	Std Error of the Estimate	Change statistics					
					R square change	F change	df1	df2	Sig. F change	
1	.079 <sup>a</sup>	.006	.002	1.291	.006	1.606	1	256	.206	
2	.731 <sup>b</sup>	.531	.529	.887	.529	144.407	2	254	.000	
a. Predictors: (Constant), Socio economic status.										
b. Predictors: (Constant), Socio economic status, Total length of sport participation, Weekly sport participation.										
c. Dependent variable: Grade of 2016 half yearly examination.										

#### 4.3.3. Sport Participation and Self-esteem of participants

In order to identify the relationship between Sport participation and Self-esteem of student respondents (N=300) researcher uses both types of Sport participation. These are, Weekly sport participation and Total length of sport participation here.

##### a. Weekly Sport participation and Self-esteem analysis

In order to identify the relationship between Weekly sport participation (M=2.75, SD=1.155) and Self-esteem (M=27.26, SD=3.585) Pearson Correlation Coefficient data analysis is done. Table 11 describes the correlation result.

Table 11. Correlation result of Weekly sport participation and Self-esteem score.

		Weekly participation	Self-esteem score
Weekly participation	Pearson Correlation	1	.330**
	Sig. (2-tailed)		.000
	N	300	300
Self-esteem score	Pearson Correlation	.330**	1
	Sig. (2-tailed)	.000	
	N	300	300

\*\*Correlation is significant at the 0.01 level (2-tailed).

From Table 11 it is found that, Pearson data analysis revealed a positive moderate correlation  $r=.330$  in between Weekly sport participation and Self-esteem. The significance value here is  $P=.000$  which is smaller

than .05. That means this correlation was statistically significant. Linear Regression analysis determines the effect on one another.

Table 12. ANOVA <sup>a</sup> (Weekly sport participation and Self-esteem).

Model		Sum of Squares	df	Mean Square	F	Sig.
1	Regression	418.506	1	418.506	36.416	.000 <sup>b</sup>
	Residual	3424.731	298	11.492		
	Total	3843.237	299			

a. Dependent Variable: Self-esteem score

b. Predictor: (Constant), Weekly participation.

According to Table 12 the P-value (Sig.) is .000. Which is less than  $\alpha$  at 95% level of significance. This represent that the model is significant.

Table 13. Coefficients <sup>a</sup> (Weekly sport participation and Self-esteem).

Model		Unstandardized Coefficients		Standardized Coefficients	t	Sig.
		B	Std. Error	Beta		
1	(Constant)	24.443	.506		48.334	.000
	Weekly participation	1.024	.170	.330	6.035	.000

a. Dependent Variable: Self-esteem score.

Here, the Model:  $Y = 24.443 + 1.024x + \epsilon$ , where Y= Self-esteem, X= Weekly Participation,  $\beta_0 = 24.443$  which is the score of self-esteem without any effect of Weekly participation. And  $\beta_1 = 1.024$  which indicates that for every unit increase in Weekly participation, the score of Self-esteem increase by 1.024.

Table 14. Regression model Summary for Weekly sport participation and Self-esteem score.

Model	R	R Square	Adjusted R Square	Std. Error of the Estimate
1	.330 <sup>a</sup>	.109	.106	3.390

a. Predictors: (Constant), Weekly participation.

From Table 14, the R square value= 0.109. That means, with the help of the model it can describe 10.9% of the nature of data. The rest is determined by unknown factors. This model finally concludes that, there is a positive effect of Weekly participation of sports in the score of student respondents' Self-esteem. With the increase of Weekly sport participation in the sports, the student respondents' score of Self-esteem increase.

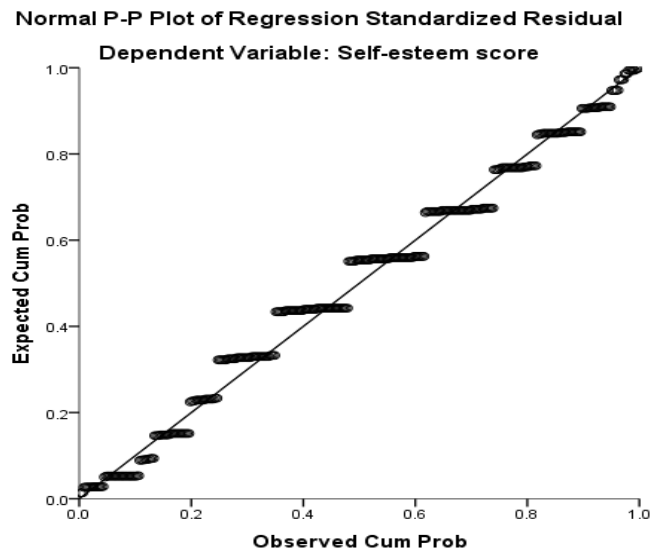


Figure 10. Self-esteem vs Weekly participation: Normal P-P plot of Regression Standardized Residual.

From Figure 10, the P-P plot is found that the Observed Cumulative Probability plot is very closed to the expected cumulative probability line. So it indicates clearly that the model is significant.

b. Total length of sport participation and Self-esteem analysis

In order to identify the relationship between Total length of sport participation (M=4.82, SD=1.479) and Self-esteem (M=27.26, SD=3.585) Pearson Correlation Coefficient analysis is done. Table 15 below describes the correlation result.

Table 15. Result of Correlations for Total length of sport participation and Self-esteem.

		Self-esteem score	Total length of sport participation
Self-esteem score	Pearson Correlation	1	.761**
	Sig. (2-tailed)		.000
	N	300	258
Total length of sport participation	Pearson Correlation	.761**	1
	Sig. (2-tailed)	.000	
	N	258	258

\*\*Correlation is significant at the 0.01 level (2-tailed).

From Table 15, the Pearson Correlation coefficient value  $r=0.761$ . That indicates that, there is a strong positive association between Self-esteem and the Total length of sports participation. To analyze that relation Linear regression analysis was conducted.

Table 16. ANOVA <sup>a</sup> (Total length of sport participation and Self-esteem).

Model		Sum of Squares	df	Mean Square	F	Sig.
1	Regression	1939.317	1	1939.317	351.913	.000 <sup>b</sup>
	Residual	1410.761	256	5.511		
	Total	3350.078	257			

a. Dependent Variable: Self-esteem score

b. Predictor: (Constant), Total length of sport participation.

Here, the P-value (Sig.) is .000. Which is less than  $\alpha$  at 95% level of significance. It indicates the model is significant.

Table 17. Coefficients <sup>a</sup> (Total length of sport participation and Self-esteem).

Model		Unstandardized Coefficients		Standardized Coefficients	t	Sig.
		B	Std. Error	Beta		
1	(Constant)	18.317	.499		36.724	.000
	Total length of sport participation	1.857	.099	.761	18.759	.000

a. Dependent Variable: Self-esteem score.

Here, Model:  $Y = 18.317 + 1.857X + \epsilon$ . Where, Y= Self-esteem score, X= Total length of sport participation,  $\beta_0 = 18.317$ , this is the score of Self-esteem without any effect of Total length of sport participation and  $\beta_1 = 1.857$  which indicates that for every unit increase in the Total length of sports participation, the score of Self-esteem increase by 1.857.



Table 18. Regression model Summary of Total length of sport participation and Self-esteem analysis.

Model	R	R Square	Adjusted R Square	Std. Error of the Estimate
1	.761 <sup>a</sup>	.579	.577	2.348

a. Dependent Variable: Self-esteem score

b. Predictor: (Constant), Total length of sport participation.

Here in Table 18, the R square value = 0.579. That means with the help of the model it can describe 57.9% of the nature of data. The rest is determined by unknown factors. From here Conclusion can be done that, there is a positive impact of Total length of sport participation on Self-esteem score of participants. With the increase of Total length of sport participation, the student respondents' score of Self-esteem also increase.

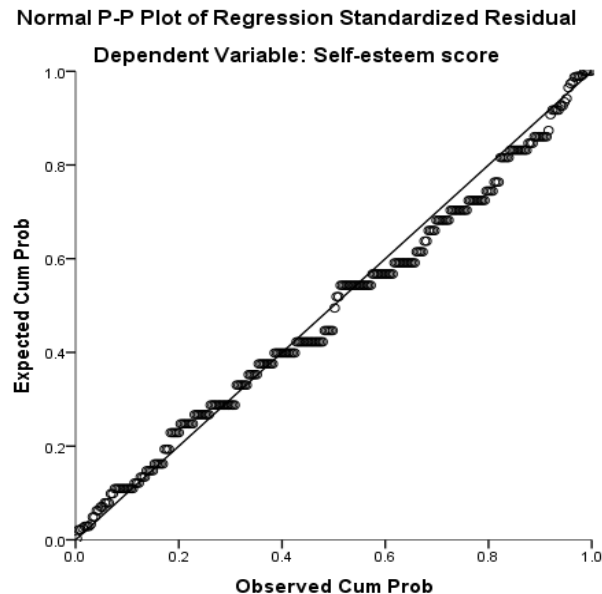


Figure 11. Total length of sport participation vs Self-esteem: Normal P-P plot of Regression Standardized Residual.

From Figure 11, in the P-P plot the Observed Cumulative Probability plot is very closed to the expected cumulative probability line. It easily concludes that the model is significant.

#### 4.3.4. Sport Participation and SWB of participants

In order to identify the relationship between Sport participation and SWB of student respondent similar analyzing process is followed by the researcher. From previous analysis of Socio economic status correlation with SBW (Table 9) significant positive association was found. Same correlation significance was confirmed during the regression analysis of controlling Socio economic status (Table 10). Therefore, Socio economic status of respondents' family will be added as independent variable with Weekly sport participation and Length of sport participation during regression analysis.

##### a. Weekly Sport participation, Socio economic status and SWB

In order to identify the correlation between Weekly sport participation ( $M=2.75$ ,  $SD=1.155$ ) and SWB ( $M=6.09$ ,  $SD=1.463$ ), Pearson Correlation Coefficient analysis is conducted. Table 19 describes the correlation result.

Table 19. Pearson Correlations result of Weekly sport participation and SWB analysis.

		Weekly participation	SWB score
Weekly participation	Pearson Correlation	1	.602**
	Sig. (2-tailed)		.000
	N	300	300
SWB score	Pearson Correlation	.602**	1
	Sig. (2-tailed)	.000	
	N	300	300

\*\*Correlation is significant at the 0.01 level (2-tailed).

From Table 19, the Pearson Correlation coefficient (r) value is 0.602. It means there is a moderate positive association between SWB score and Weekly sport participation of the study. Result of Regression analysis of Weekly sport participation, Socio economic status and dependent variable SWB is described below.

Table 20. ANOVA <sup>a</sup> (Weekly sport participation, Socio economic status and SWB analysis).

Model		Sum of Squares	df	Mean Square	F	Sig.
1	Regression	199.399	2	99.700	67.244	.000 <sup>b</sup>
	Residual	440.347	297	1.483		
	Total	639.747	299			

a. Dependent Variable: SWB score

b. Predictor: (Constant), Weekly sport participation, Socio economic status.

Here in Table 20, the P-value (Sig.) is .000. This value is less than  $\alpha$  at 95% level of significance. That means the model is significant.

Table 21. Coefficients <sup>a</sup> (Weekly sport participation, Socio economic status and SWB analysis).

Model	Unstandardized	Standardized	t	Sig.
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		Coefficients		Coefficients		
		B	Std. Error	Beta		
1	(Constant)	3.486	.384		9.090	.000
	Socio economic Status	.247	.121	.099	2.038	.042
	Weekly participation	.681	.061	.538	11.082	.000

a. Dependent Variable: SWB score.

According to Table 21, Model:  $Y = 3.486 + 0.247x_1 + 0.681x_2 + \varepsilon$  and here,  $Y$  = SWB score,  $X_1$  = Socio economic status,  $X_2$  = Weekly Participation,  $\beta_0 = 3.486$ , This is the SWB score without any effect of socio economic status and weekly participation,  $\beta_1 = 0.247$  which mean, for every unit increase in the Socio-economic status, the SWB score increases by 0.247 and  $\beta_2 = 0.681$  indicates that for every unit increase in the Weekly participation, the SWB score increases by 0.681.

Table 22. Regression model Summary of Weekly sport participation, Socio economic status and SWB analysis.

Model	R	R Square	Adjusted R Square	Std. Error of the Estimate
1	.558 <sup>a</sup>	.312	.307	1.218

a. Dependent Variable: SWB score

b. Predictor: (Constant), Weekly sport participation, Socio economic status.

According to Table 22, R square value is 0.312. That means from the model it describes 31.2% of the variability of the response variable SWB score with the help of predictor variables Weekly participation and Socio economic status. The rest is determined by unknown factors.

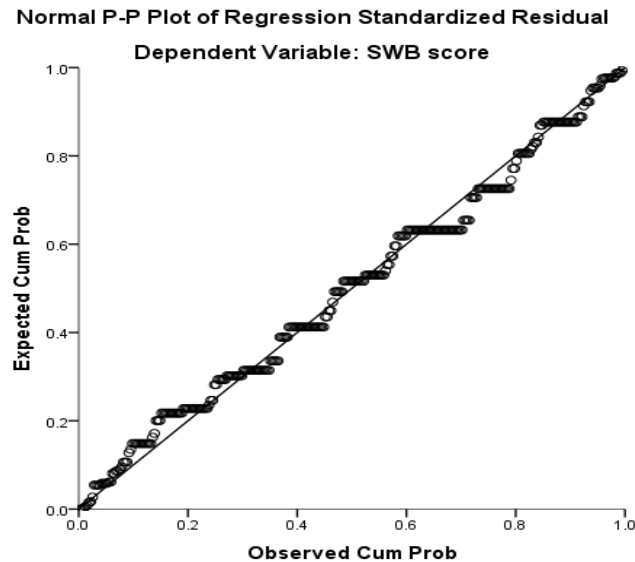


Figure 12. Weekly sport participation, Socio economic status vs SWB: Normal P-P plot of Regression Standardized Residual.

Here, from the P-P plot, Observed Cumulative Probability plot is very closed to the expected cumulative probability line. It concludes that the model is significant.

b. Total length of sport participation and SWB analysis

In order to identify the relationship between Total length of sport participation ( $M=4.82$ ,  $SD=1.479$ ) and SWB ( $M=6.09$ ,  $SD=1.463$ ), Pearson Correlation analysis is conducted. Table 23 below describes the correlation result.

Table 23. Correlations result of Total length of sport participation and SWB .

		SWB score	Total length of sport participation
SWB score	Pearson Correlation	1	-.035
	Sig. (2-tailed)		.577
	N	300	258
Total length of sport participation	Pearson Correlation	-.035	1
	Sig. (2-tailed)	.577	
	N	258	258

According to Table 23, the Pearson Correlation coefficient is negative here and the value is -.035. And significance value here is also .577 (P=.577) which is much higher than the value .05. This indicates that the correlation between Total length of sport participation and SWB is insignificant for the given data of this study.

#### 4.3.5. Sport Participation and Academic achievement of participants

In order to identify the relationship between Sport participation and Academic achievement of the participants' similar procedures is followed by the researcher.

##### a. Weekly sport participation and Academic achievement

(Grade of 2016 half yearly examination) analysis

In order to identify the relationship between Weekly sport participation (M=2.75, SD=1.155) and Academic achievement (Grade of

2016 half yearly examination) (M=2.91, SD=1.111), Pearson Correlation analysis is done. Table 24 describes the correlation result.

Table 24. Correlations result of Weekly sport participation and Academic achievement (Grade of 2016 half yearly examination).

		Weekly participation	Grade of 2016 half yearly Examination
Weekly participation	Pearson Correlation	1	.582**
	Sig. (2-tailed)		.000
	N	300	300
Grade of 2016 half yearly Examination	Pearson Correlation	.582**	1
	Sig. (2-tailed)	.000	
	N	300	300

\*\*Correlation is significant at the 0.01 level (2-tailed).

As per Table 24, the Pearson Correlation coefficient is positive and the value  $r=.582$ . And the significance value  $p=.000$ . That means there is a moderate positive association between Grade of 2016 half yearly examination and Weekly participation and the correlation is significant.

Linear regression analysis revealed the association between these variables.

Table 25. ANOVA <sup>a</sup> (Weekly sport participation and Grade of 2016 half yearly examination).

Model		Sum of Squares	df	Mean Square	F	Sig.
1	Regression	169.166	1	169.166	152.617	.000 <sup>b</sup>
	Residual	330.314	298	1.108		
	Total	499.480	299			

a. Dependent Variable: Grade of 2016 half yearly Examination.

b. Predictor: (Constant), Weekly sport participation.

Here Table 25 shows that, the P-value (Sig.) is .000. Which is less than  $\alpha$  at 95% level of significance. That indicates the model is significant.

Table 26. Coefficients<sup>a</sup> (Weekly sport participation and Grade of 2016 half yearly examination).

Model		Unstandardized Coefficients		Standardized Coefficients	t	Sig.
		B	Std. Error	Beta		
1	(Constant)	3.431	.157		21.846	.000
	Weekly participation	.651	.053	.582	12.354	.000

a. Dependent Variable: Grade of 2016 half yearly examination.

Here, Model:  $Y = 3.431 + .651x + \epsilon$ . Where, Y= Grade of 2016 half yearly examination, X= Weekly sport participation,  $\beta_0 = 3.431$ , this is the Grade of 2016 half yearly examination without any effect of Weekly participation and  $\beta_1 = .651$  which indicates that for every unit increase in the Weekly sports participation, Grade of 2016 half yearly examination increase by .651.

Table 27. Regression model Summary of Weekly sport participation and Grade of 2016 half yearly examination analysis.

Model	R	R Square	Adjusted R Square	Std. Error of the Estimate
1	.582 <sup>a</sup>	.339	.336	1.053

a. Dependent Variable: Grade of 2016 half yearly examination.

b. Predictor: (Constant), Weekly of sport participation.

According to Table 27, R square value = 0.339. That means with the help of this model it can describe 33.9% of the nature of data. The rest is determined by unknown factors. This model shows that there is a positive impact of Weekly sport participation on Grade of 2016 half yearly



examination. With the increase of Weekly sport participation, the student respondents' Grade of 2016 half yearly examination also increase.

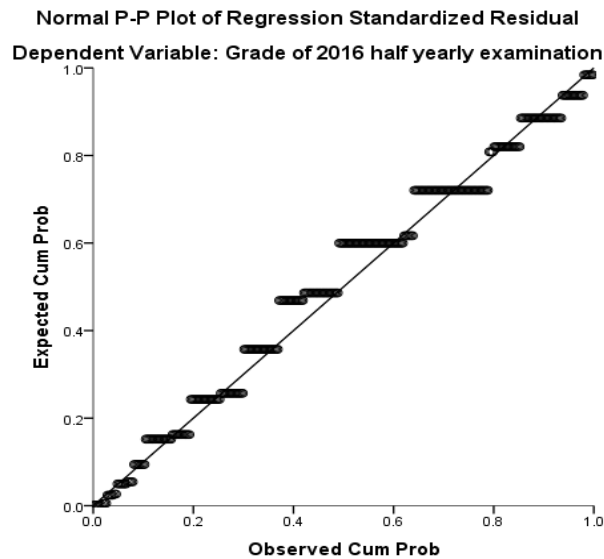


Figure 13. Weekly sport participation vs Grade of 2016 half yearly examination: Normal P-P plot of Regression Standardized Residual.

Here in the P-P plot it shows that, the Observed Cumulative Probability plot is very closed to the expected cumulative probability line. So it can be concluded that the model is significant.

b. Total length of sport participation and Grade of 2016 half yearly examination analysis

In order to identify the relationship between Total length of sport participation ( $M=4.82$ ,  $SD=1.479$ ) and Grade of 2016 half yearly

examination (M=2.91, SD=1.111), Pearson Correlation analysis is done.

Table 28 below describes the correlation result.

Table 28. Correlations result of Total length of sport participation and Grade of 2016 half yearly examination.

		Total length of sport participation	Grade of 2016 half yearly Examination
Total length of sport participation	Pearson Correlation	1	.658**
	Sig. (2-tailed)		.000
	N	258	258
Grade of 2016 half yearly Examination	Pearson Correlation	.658**	1
	Sig. (2-tailed)	.000	
	N	258	300

\*\*Correlation is significant at the 0.01 level (2-tailed).

As per the Table 28, the Pearson Correlation coefficient value is positive here and the value is .658. And significance value here is .000 (P=.000) which is much lower than the .05. This indicates that the correlation between these variables have moderate positive association.

Result of linear regression analysis is described below.

Table 29. ANOVA <sup>a</sup> (Total length of sport participation and Grade of 2016 half yearly examination).

Model		Sum of Squares	df	Mean Square	F	Sig.
1	Regression	111.734	1	111.734	195.639	.000 <sup>b</sup>
	Residual	146.208	256	.571		
	Total	257.942	257			

a. Dependent Variable: Grade of 2016 half yearly Examination.

b. Predictor: (Constant), Total length of sport participation.

From the Table 29, the P-value (Sig.) is 0.000. Which is less than  $\alpha$  at 95% level of significance. That means the model is significant.

Table 30. Coefficients <sup>a</sup> (Total length of sport participation and Grade of 2016 half yearly examination).

Model		Unstandardized Coefficients		Standardized Coefficients	t	Sig.
		B	Std. Error	Beta		
1	(Constant)	3.399	.161		21.169	.000
	Total length of sport participation	.446	.032	.658	13.987	.000

b. Dependent Variable: Grade of 2016 half yearly examination.

Here, Model:  $Y = 3.399 + .446x + \epsilon$ . Where, Y= Grade of 2016 half yearly examination score, X= Total length of sport participation,  $\beta_0 = 3.399$ , this is the score of Grade of 2016 half yearly examination without any effect of Total length of sport participation and  $\beta_1 = .446$  which indicates that for every unit increase in the Total length of sport participation, the Grade of 2016 half yearly examination increase by .446.

Table 31. Regression model Summary of Total length of sport participation and Grade of 2016 half yearly examination analysis.

Model	R	R Square	Adjusted R Square	Std. Error of the Estimate
1	.658 <sup>a</sup>	.433	.431	.756

a. Dependent Variable: Grade of 2016 half yearly examination.

b. Predictor: (Constant), Total length of sport participation.

According to Table 31, R square value = 0.431. That means with the help of this model it can describe 43.1% of the nature of data. The rest is determined by unknown factors. From the model we can conclude that there is a positive impact of Total length of sport participation on Grade of 2016

half yearly examination. With the increase of Total length of sport participation, the student respondents' Grade of 2016 half yearly examination also increase.

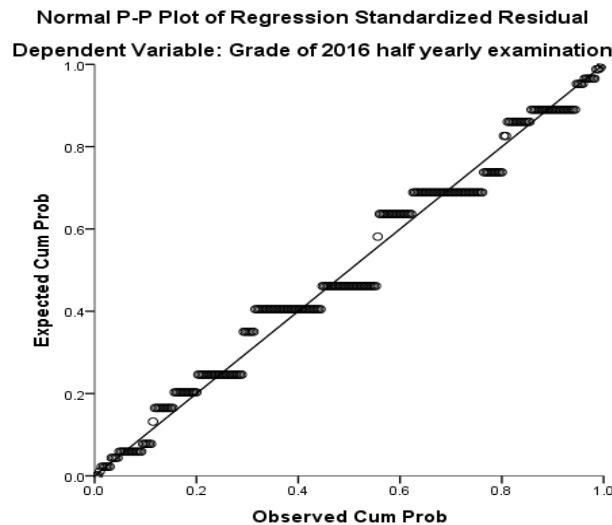


Figure 14. Total length of sport participation vs Grade of 2016 half yearly examination: Normal P-P plot of Regression Standardized Residual.

Figure 14 shows that, the Observed Cumulative Probability plot is very closed to the expected cumulative probability line. So it can be concluded that the model is significant.

#### 4.4. Summary of Key Analysis

This study has examined the sport participation pattern of high school students of Dhaka, Bangladesh. And also determined the relationship

between sports participation and high school students' Self-esteem, SWB and Academic achievement of Dhaka city. For this study, Socio economic status was also considered as one of the probable key affecting factor of student respondents' Self-esteem, SWB and Academic achievement. To achieve the accurate result of sport participation impact, Socio economic status was also considered in the process of the analysis. From the correlation analysis of Socio economic status with Self-esteem, SWB and grade of examination it was revealed that, Socio economic status only have weak positive relation with respondents SWB of this study. For the given data of this particular study Socio economic status correlation with other two dependent variables was insignificant. Again hierarchical regression analysis for controlling Socio economic status result also confirmed these insignificances of Socio economic status correlation with Self-esteem and Grade of examination. It also confirmed the positive correlation between Socio economic status and SWB. Table 32 shows the summary of key analysis of this study.

Table 32. Summary of key analysis results of the study.

Independent or Predictor Variable	Dependent Variables		
	Self-esteem	SWB	Grade of 2016 half yearly examination
Socio economic status	a. Correlation was insignificant. b. Significance value P=.797.	a. Weak positive significant correlation. b. Pearson correlation coefficient r=.165. c. Significance value P=.004. d. With the increase of Socio economic status SWB also increase.	a. Correlation was insignificant. b. Significance value P=.173.
Weekly sport participation	a. Significant moderate positive correlation. b. Pearson correlation coefficient r=.330. c. Significance value P=.000. d. With the increase of Weekly Participation Self-esteem also increase. e. Regression model describes 10.9% nature of the data.	a. Significant moderate positive correlation. b. Pearson correlation coefficient r=.602. c. Significance value P=.000. d. With the increase of Weekly Participation SWB also increase. e. Regression model describes 31.2% nature of the data.	a. Significant moderate positive correlation. b. Pearson correlation coefficient r=.582. c. Significance value P=.000. d. With the increase of Weekly Participation Grade of examination also increase. e. Regression model describes 33.9% nature of the data.
Total length of sport participation	a. Significant strong positive correlation. b. Pearson correlation coefficient r=.761. c. Significance value P=.000. d. With the increase of Total length of Participation Self- esteem also increase. e. Regression model describes 57.9% nature of the data.	a. Correlation was insignificant. b. Significance value P=.577.	a. Significant moderate positive correlation. b. Pearson correlation coefficient r=.658. c. Significance value P=.000. d. With the increase of Total length of Participation Grade of examination also increase. e. Regression model describes 43.1% nature of the data.

## **Chapter 5. Discussion**

### **5.1. Summary of Key Findings**

This particular study has examined the sport participation pattern of high school students of Dhaka, Bangladesh and sports participation relationship with high school students' Self-esteem, SWB and Academic achievement of Dhaka city. These relationships were never judged in the country before. This study was intended to find out these relationships because knowing the importance of sport participation and its relation with other behavioral factors of students by the student themselves and their guardians are very much important. And it is much more important when they are staying in a highly populated city like Dhaka. Sample size for this study was three hundred. High school students of Dhaka city were the respondents for this study.

According to the results of data analysis about the sport participation pattern in a week by the high school students of Dhaka, it was found that, in spite having less sport facilities many high school students were participating in sports. Those who all were participating in sports were playing mainly the most famous sports of the country Cricket and Football. But due to the shortage and unavailability of Cricket and Football grounds in the city students were playing these sports with their friends in smaller

places available around their houses. Another important fact was found that, the high school students in Dhaka liked to play Team sports more than that of participating at Individual sports. On the other hand, it was also found that good number of student respondents were not participating in sport at all. To be more specific, from this study it was found that 14% student respondents were not participating at any kind of sport at all. And around 31.7% were participating only 1-2 days of a week. And 1-2 days of sport participation by a high school student is very less. As a whole, more than 45% of the students were either not participating or participating very less in sport, means not more than two days of a week. Others were participating in sports. Study data also showed about the time spent by the students when they normally participated in sports. From the study it was found that, around 60% of the student participants spent time within one hour to two hours while participating in sports. The number of students participating in sports 7 days of a week was very less and only 8.7% of the total respondents of the study. Among the sport participant student respondents, maximum number were participating for 3-4 days of a week and it was 28.7% of total respondent.

In order to identify the relationship between sport participation and Self-esteem, SWB and Academic achievement, researcher intended to select



sample from same Socio economic status and family background. So that the effect of these factors can be minimized on the dependent variables of the study. From the study data it was found that maximum of the student respondents was from middle class family. And almost 50% of their fathers were involved in small businesses. In case of mothers' profession, around 92% of their mothers were unemployed and were housewives. And about their family type, almost 85% were from nuclear family where respondent, parents, brothers and sisters were staying together. From this given data of the study, it was found that Socio economic status of respondents' family did not have correlation with Self-esteem and Academic achievement of the student respondents. There was only a relationship between Socio economic status and respondents' SWB. Hierarchical regression analysis for controlling Socio economic status was also conducted and it also confirmed about the significant correlation of Socio economic status with SWB.

When calculating the relationship of Sport participation and Self-esteem, where participation was divided into two-part; Weekly participation and Total length of participation and it was found that, both types of Sport participation had positive relationship with Self-esteem. With the increase of the Weekly sport participation Self-esteem of students also increase. And again, with the increase of Total period or length of sport participation the

Self-esteem of respondents also increased. That means, students who were participating in sports for last more number of months their Self-esteem were more. From the study data it was found that, the longer the length of participation was the higher the Self-esteem score was.

While calculating the relationship of both types of Sport participation with SWB, positive association was found with Weekly sport participation and SWB. Earlier discovery of positive Socio economic status correlation with SWB was also considered during the regression analysis here. From the study data it was clear that, with the increase of Weekly sport participation SWB score of the student respondents also increase. And same way with the increase of Socio economic status, SWB score of student respondents also increase. But in case of Total length of participation and SWB relationship, from this given data it was found that the relation was insignificant for this study.

The most interesting and important result of the study was the relation of the Sport participation and Academic achievement of student respondents. It's important because students' parents were very serious and concern about their children results of examination in the country. As students were just finished their half yearly examination of 2016 during data collection therefore the result of that was considered for calculating with

Weekly sport participation and Total length of participation. It was found that, Weekly sport participation had positive relation with result of the examination. With the increase of the Weekly participation in sports by the students their grades also increase. That means academic results of students are positively related with students' Weekly sport participation. Again, while analyzing the correlation of Total length of sport participation and Grade of 2016 half yearly examination the relation was found strongly positive. From the data It was found that with the increase of their long term sport participation result (Grades) also improve. That means, students those who were participating in sport for longer period of time were achieving higher grade compare to the student participants those who were participating for short period of time. Both the analysis revealed that Sport participation had a strong positive impact on students' Academic achievement in Dhaka city.

## **5.2. Academic Implication**

Although this study was conducted within a specific area and within a specific context but this study results of this study showed the similarity with previous researches in the field of sport participation impact on human life. The results of this study can nonetheless be related to the researches discussed and described in Chapter 2. Sport participation of students have

positive relation with their Self-esteem, SWB and Academic achievement identified in this study in the context of this convergent study are very much consistent with the findings from the literature.

A sound body is a house of a sound mind. Sport participation provides both. The purpose of the study was to create the awareness about the Sport participation by showing the results of the study among the students and their parents. This study was the first step in the country to find out the relationship between Sport participation and behavioral characteristics of the students of Dhaka, Bangladesh. This result of this study is also indicating about the importance of future study on this sector which was neglected before. Self-esteem and SWB is well established factors for the success of any individual around the world. This study also goes in depth to identify both Self-esteem and SWB among the high school students of Dhaka, Bangladesh. This study will be an eye opener for the academic researchers of the country. And for any kind of future research in Bangladesh, this particular study will be a guideline for the researcher. This study provides great guidelines and opportunities in the field of sport participation for the research programs in the country. Various researches on the field of child and student development are already there in the country. After this study, researchers can use or add sport participation as one of the

important developing tool with their existing researches in the field of child or student development.

### **5.3. Practical Implication**

In this particular study researcher has shown that sport participation has great influences on high school students' Self-esteem, SWB and academic achievement at Dhaka city. Which indicates sport participation as one of the problem solving framework and effecting tool for the parents in the development process of their kids. At present, the parents of Dhaka city are very much concern about the academic achievements of their children for their better future. With the increase of competition like achieving best result, admission in reputed academic institutions, finding good job etc. students are focused more on this. Many of them are not focusing on the importance of sport participation or involving them in any kind of physical activities. After this study, these huge amount of students from the city will get idea of sport participation importance. However, their parents will send them to play when they will also realize from this study, how much important for their children to participate in sport to increase their Self-esteem and SWB. Another important thing of concern is increasing the sport facilities for the mass population especially young generation of Dhaka. Based on the results of the study, policy makers should realize the

importance of sport participation by the students and ensure providing much more sport facilities for them. School authorities should provide or ensure more sport facilities for their students at their respective schools and colleges. Most importantly, students will realize the importance of sport participation and involve themselves more in sport activities based on the positive outcomes of the study. And finally if the students start participating more in sports they are most likely to continue this habit of sport participation in future stages of life also. May be this will lead to increase the overall participation in the whole country in future.

#### **5.4. Limitations of the Study**

Limitations are part of any kind of research. No research is perfect. No exception with this research also. The limitations of this particular study are addressed as implicit recommendations for the future study in the field of sport in Bangladesh. This research was intended just to find out the basis relation between Sport participation and Self-esteem, SWB and Academic results of high school students of Dhaka city. Big limitation for this study was that, Sport participation and its impacts were never being studied in Bangladesh before. So there were no previous data to relate the present results of the study. The general limitation of the study was respondents bias. All the respondents of the study were students of high school of Dhaka city.

They were not familiar with these types of data collection tool(questionnaire).

Another limitation of this study was the sampling design. Due to some restrictions for this particular study, data was collected from a single high school which obviously does not represent the huge amount of students studying in many other high schools around Dhaka city. Number of the respondents was also a limitation of the study. Only 300 student respondents participated in this study. This sample size was not enough to assess the statistical significance of the result. Again this results cannot be generalized for whole Bangladesh. However, it can be considered as an illustrative sample of the country.

Another big limitation of the study was that; researcher of the study was not physically present in the study place where the study was conducted. For this researcher had to depend on the specialized professionals to collect the data from the respondents. As there was no previous study on this sector of sport participation therefore the student respondents of high school from Dhaka were not familiar with this kind of study questions and process.

## **5.5. Future Research Directions**

There were some obvious limitations in the study that limits it to be generalized in the sport context. Though the sample was collected randomly

among the high school students but the sample was not enough to represent the general high school students since the study was conducted on the high school students of Dhaka city where a huge number of students were staying. This study was focused on students from same background. Thus, future studies should focus on students of diverse background and different cultures. Future studies should also focus on different cities of the country.

Big limitation of the study was no previous research on this sport sector in the country. Future research should increase in this sector of sport like all other types of researches. The purpose of the study was to create awareness among the students, their parents and the policy makers about the sport participation and its relation with positive lifestyle of the young students. Prior studies around the world also find these relationships. Future studies should focus more on these type of issues and present the result in front of all. So further research on sport participation and its impacts on various level of the society is very much essential in Bangladesh.

## **5.6. Conclusion**

Sport participation contributes in increasing the Self-esteem, SWB and Academic achievements of any students. Sport participation is considered as one of the effective developing tool of many human qualities around the world. Highly populated country like Bangladesh can take the



advantage out of this. Specifically, regular sport participation can play a big role for the development of students in highly populated city Dhaka, Bangladesh. In order to increase the overall sport participation in the country students especially high school students and their parents need to know about the benefit of it. Knowing about the contribution of sport participation on young students' Self-esteem, SWB and Academic results will motivate the students, their parents and policy makers to improve the sport facilities in future in Dhaka city. Keeping this importance in mind, this study examined the relationship between high school students sport participation and their Self-esteem, SWB and Academic achievement in Dhaka, Bangladesh. Data was collected from three hundred high school students (N=300) of Dhaka city. The primary result about the participation of sport shows that many high school students were not participating in sports. Following the depth analysis, this study revealed that sport participation had positive relation with the increase of high school students' Self-esteem, SWB and Academic result in Dhaka. The parents of students of Dhaka should increase their focus about their children sport participation. If the student participation increase they will continue this habit of sport participation at older age also. Thus overall sport participation will increase

in the country and whole society will start enjoying the sport benefits of the sport participation.

## References

- Andrews, F.M., & Robinson, J.P. (1991). Measures of subjective well-being. In J.P. Robinson, P.R. Shaver, & L.S. Wrightsman (Eds.), *Measures of personality and social psychological attitudes* (pp. 61-114). New York: Academic Press.
- Andrews, F.M., & Withey, S.B. (1976). *Social indicators of well-being: America's perception of life quality*, New York: Plenum Press
- Arnold, P.J. (1984). Sport, moral education and the development of character. *Journal of the Philosophy of Education*, 18, 275-281.
- Becchetti A, Pelloni A, Rossetti F (2008) Relational goods, sociability, and happiness. *Kyklos* 61(3):343–363.
- Biddle SJH. Emotion, mood and physical activity. In: Biddle SJH, Fox KR, Boutcher SH (eds) *Physical activity and psychological well-being*. London: Routledge (in press).
- Bowker, A., & Findlay, L. (2005). The link between competitive sport participation and self-esteem in early adolescence: A consideration of gender and sport orientation. Manuscript submitted for publication.
- Brajsa-Zganec, Andreja, Marina Merkas, and Iva Sverko. "Quality of life and leisure activities: How do leisure activities contribute to subjective well-being?" *Social Indicators Research* 102.1 (2011): 81-91.
- Bredemeier, B.J., Weiss, M.R., Shields, D.L., & Shewchuck, R.M. (1986). Promoting moral growth in a summer sport camp: The implementation of theoretically grounded instructional strategies. *Journal of Moral Education*, 15, 212-220. EJ 343 09.
- Butcher, J. E. (1989). Adolescent girls' sex role development: Relationship with sports participation, self-esteem, and age at menarche. *Sex Roles*, 20, 575–593.

- Cameron, M., & MacDougall, C. J. (2000). Crime prevention through sport and physical activity (Vol. 165). Canberra: Australian Institute of Criminology.
- Campbell, D. T., & Stanley, J. C. (1963). Experimental and quasi-experimental designs for research on teaching. Chicago: American Educational Research Association.
- Cantril, H. (1966). Pattern of human concerns. New Brunswick, NJ: Rutgers University Press.
- Coalter, F., Allison, M. & Taylor, J. 2000, The Role of Sport in Regenerating Deprived Urban Areas, The Scottish Executive Central Research Unit, Edinburgh.
- Cohen, L., Manion, L., & Morrison, K. (2003). Research methods in education (5th ed.). London: RoutledgeFalmer, 47.
- Collis, M. & Griffin, M. 1993, "Developing a course for young offenders", Youth Studies Australia, vol. 12, no. 3, pp. 25–8.
- Cousins, M. E. (2004). The relationship between student participation rates in Texas public school extracurricular activity programs and related factors of academic achievement, attendance, drop outs and discipline, 23-25.
- Development of Bangladesh, National Report of Bangladesh, September 2004, Ministry of Education, available at <http://www.ibe.unesco.org/International/ICE47/English/Natreps/reports/bangladesh.pdf> accessed on 28th February 2016.
- Dewey, J. (1939) Theory of valuation. Chicago, IL: University of Chicago Press.
- Dey, I. (2003). Qualitative data analysis: A user friendly guide for social scientists. Routledge, 11.
- Diener, E. (1994). Assessing subjective well-being: Progress and opportunities. Social Indicators Research, 31, 103-157.

- Diener, E., Eunkook, S.M., Lucas, R.E., & Smith, H.L. (1999). Subjective well-being: Three decades of progress. *Psychological Bulletin*, 125, 276-302.
- Diener, E., Emmons, R. A., Larsen, R. J., & Griffin, S. (1985). The Satisfaction with Life Scale. *Journal of Personality Assessment*, 49, 71-75.
- Diener, E., & Seligman, M.E.P. (2002). Very Happy People. *Psychological Science*, 13 (1), 81-84.
- Diener, E., Oishi, S., & Lucas, R. E. (2002). Subjective well-being: The science of happiness and life satisfaction. In C.R. Snyder & S.J. Lopez (Ed.), *Handbook of Positive Psychology*. Oxford and New York: Oxford University Press.
- Dishman, R. K., Hales, D. P., Pfeiffer, K. A., Felton, G. A., Saunders, R., Ward, D. S. & Pate, R. R. (2006). Physical self-concept and self-esteem mediate cross-sectional relations of physical activity and sport participation with depression symptoms among adolescent girls. *Health Psychology*, 25(3), 396.
- Donaldson, S. J., & Ronan, K. R. (2006). the effects of sports participation on young adolescents' emotional well-being. *Adolescence*, 41(162), 369.
- Donnelly, P., & Coakley, J. (2007). The use of sport to foster child and youth development and education. *Literature Reviews on Sport for Development and Peace*, 7, p-24-26.
- Dost, M. T. (2006). Subjective well-being among university students. *Hacettepe Universitesi Egitim Fakultesi Dergisi*, 31(31).
- Downward PM, Rasciute S (2011) Does sport make you happy? An analysis of the well-being derived from sports participation. *Int Rev Appl Econ* 25(3):331–348.
- Dwyer, T., Sallis, J. F., Blizzard, L., Lazarus, R., & Dean, K. (2001). Relation of academic performance to physical activity and fitness in children. *Pediatric Exercise Science*, 13(3), 225-237.

- Fleeson, W., Malanos, A., & Achille, N. (2002). An intra-individual process approach to the relationship between extraversion and positive affect: Is acting extraverted as 'good' as being extraverted? *Journal of Personality and Social Psychology*, 83, 1409-1422.
- Fox, K. R. (Ed.). (1997). *The physical self: From motivation to well-being*. Windsor, ON: Human Kinetics.
- George D & Mallery P (2003) *SPSS for windows step by step: A sample Guide & reference* Boston; Allyn & Bacon.
- Goudas, M., Dermitzaki, I., Leondari, A., & Danish, S. (2006). The effectiveness of teaching a life skills program in a physical education context. *European Journal of Psychology of Education*, 21, 429-438.
- Green, C. (2008). Sport as an agent for social and personal change. *Management of sports development*, 129-147.
- Harter, S. (1985). Competence as a dimension of self-evaluation: Toward a comprehensive model of self-worth. In R. H. Leahy (Ed.), *The development of the self* (pp. 55- 121). New York: Academic Press.
- Harter, S. (1997). The development of self-representation. In W. D. Eisenberg (Ed.), *Handbook of child psychology: Vol. 3. Social, emotional, and personality development* (pp. 553-618). New York: Wiley.
- Jackson, S. A., & Marsh, H. W. (1986). Athletic or antisocial? The female sport experience. *Journal of Sport Psychology*, 8, 198-211.
- Karve, R. (2015). Role of school sport for positive character development. *Global Journal of Multidisciplinary Studies*, 4(9).
- Lan, C. H. (2004). Relationships among socio-economic status, parenting, academic achievement, and self-esteem in early and middle adolescence: a longitudinal study.
- Larson, R. W. (2000). Toward a psychology of positive youth development. *American Psychologist*, 55, 170-183.

- Lechner M (2009) Long-run labor market and health effects of individual sports activities. *J Health Econ* 28(4):839–854.
- Lee YH, Park I (2010) Happiness and physical activity in special populations: evidence from Korean survey data. *J Sports Econ* 11:136-156.
- Leedy, P. D., & Ormrod, J. E. (2013). *Practical research: planning and design* (10th ed.). Boston: Pearson.
- Makkai, T., Morris, L., Sallybanks, J., & Willis, K. (2003). Sport, physical activity and antisocial behavior in youth. Australian Institute of Criminology.
- Marsh, H. W. (1987). The hierarchical structure of self-concept and the application of hierarchical confirmatory factor analysis. *Journal of Educational Measurement*, 24, 17-19.
- Nettle, D. (2005). Socio-economic status and subjective well-being.
- Okpala, C. O., Okpala, A. O., & Smith, F. E. (2001). Parental involvement, instructional expenditures, family socioeconomic attributes, and student achievement. *The Journal of Educational Research*, 95(2), 110-115.
- Papacharisis, V., Goudas, M., Danish, S., & Theodorakis, Y. (2005). The effectiveness of teaching a life skills program in a school-based sport context. *Journal of Applied Sport Psychology*, 3, 247-254.
- Pavot, W. G., & Diener, E. (1993). Review of the Satisfaction with Life Scale. *Psychological Assessment*, 5, 164-172.
- Pawlowski, Tim, Paul Downward, and Simona Rasciute. "Subjective well-being in European countries-on the age-specific impact of physical activity. "European Review of Aging and Physical Activity 8.2 (2011): 93.
- Perkins, D. F., Jacobs, J. E., Barber, B. L., & Eccles, J. S. (2004). Childhood and adolescent sports participation as predictors of participation in sports and physical fitness activities during young adulthood. *Youth & Society*, 35(4), 495-520.

- Priest, R.F., Krause, J.V., & Beach, J. (1999). Four-year changes in college athletes' ethical value choices in sports situations. *Research Quarterly for Exercise and Sport*, 70(2), 170-178.
- Rasciute S, Downward PM (2010) Health or happiness? What is the impact of physical activity on the individual? *Kyklos* 63(2):256–270.
- Rosenberg, M. (1965). *Society and the adolescent self-image*. Princeton, NJ: Princeton University Press.
- Rosenberg, Morris. "The measurement of self-esteem." *Society and the adolescent self-image* 297 (1965): V307.
- Rowe, J.W., & Kahn, R.L. (1987). Human aging: Usual and successful. *Science*, 237, 143- 149.
- Sabock, R. (1985). *Coach* (3rd ed). Champaign: Human Kinetics Press, p. 271.
- Sage, G.H. (1998). *Power and ideology in American sport*. Champaign: Human Kinetic Press, pp. 264.
- Sallis, J. F., Hovell, M. F., Hofstetter, C. R., Elder, J. P., Hackley, M., Caspersen, C. J., & Powell, K. E. (1990). Distance between homes and exercise facilities related to frequency of exercise among San Diego residents. *Public health reports*, 105(2), 179.
- Silber, E., & Tippet, J. (1965). Self-esteem: Clinical assessment and measurement validation. *Psychological Reports*, 16, 1017-1071.
- Stenbacka, C. (2001). Qualitative research requires quality concepts of its own. *Management Decision*, 39(7), 551-556.
- Stephens T. Physical activity and mental health in the United States and Canada: Evidence from four population surveys. *Preventive Medicine* 1988; 17: 35–47.
- Stoll, S.K. (1995). Should we teach morality? The issue of moral education. In A. Jewett, L. Bain, & C.D. Ennis (eds.), *The curriculum process in physical education* (2nd ed) (pp.333-336). Dubuque, IA: Brown & Benchmark.



- Stoll, S.K., & Beller, J.M. (2000). Do sports build character? In J.R. Gerdy, *Sports in School: The future of an institution*. New York: Teachers College Press, pp. 18-30.
- Tafarodi, Romin W., and William B. Swann. "Two-dimensional self-esteem: Theory and measurement." *Personality and individual Differences* 31.5 (2001): 653-673.
- Tong, Y., & Song, S. (2004). A study on general self-efficacy and subjective well-being of low SES college students in a Chinese university. *College Student Journal*, 38(4), 637.
- Twenge, J. M., & Campbell, W. K. (2002). Self-esteem and socioeconomic status: A meta-analytic review. *Personality and social psychology review*, 6(1), 59-71.
- UN Department of Economic and Social Affairs Population Division, *World Population Prospects The 2015 Revision Key Findings and Advance Tables* by United Nations New York, 2015, p-23.
- UN World Population Day 2015: These are the 10 most densely populated cities on the planet, available at <http://www.ibtimes.co.uk/un-world-population-day-2015-these-are-10-most-densely-populated-cities-planet-1510315> accessed on 28th February, 2016.
- Wainer, H., & Braun, H. I. (1988). *Test validity*. Hillsdale, N.J.: L. Erlbaum Associates.
- White, K. R. (1982). The relation between socioeconomic status and academic achievement. *Psychological bulletin*, 91(3), 461.
- World Health Organization. (1999). *Partners in life skills education*. Geneva, Switzerland: World Health Organization, Department of Mental Health.
- Yin, R. K. (1994). *Case study research: design and methods* (2nd ed.). Thousand Oaks: Sage Publications, 20.

## **Appendix- A**

### **QUESTIONNAIRE**

(Respondent: High School Students of Dhaka, Bangladesh)

Data Collection for Study on

#### **The Relationship Between High School Students' Sport Participation and Their Self-esteem, Subjective Well-being and Academic Achievement: Focusing on Bangladesh.**

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#### **Respondent's Consent**

Assalamualykum. My name is Mohammad Tanvir Zaman, a student of Masters of Sport Management, Dream together Master(DTM) Program, Department of Physical Education, Seoul National University of South Korea. I am conducting an academic study titled "The Relationship Between High School Students' Sport Participation and their Self-esteem, Subjective Well-being and Academic Achievement: Focusing on Bangladesh". This survey is designed to determine the relationship of students' sport participation on their Self-esteem, Subjective well-being and Academic achievement. As a high Scholl student of Dhaka city you are selected as one of the respondents for this study. Your opinion is very much important for me in this regard. All responses are confidential and will be reviewed only

by the researcher. No identifying information of the respondent will be collected or distributed.

Ser	Questions	Code	Response
<b>A</b>	<b>SPORT PARTICIPATION FIGURE</b>		
A-1	How many days you participate in sport in a week?	Don't participate at all	
		1-2 days	
		3-4 days	
		5-6 days	
		7 days	
A-2	How much time you spend in sport during participation?	Less than 30 minutes	
		More than 30 minutes but less than 1 hour	
		More than 1 hour but less than 1.5 hour	
		More than 1.5 hour but less than 2 hours	
		More than 2 hours	
A-3	Recently, how long have you been participating in sport?	Last 1-2 months	
		Last 3-4 months	
		Last 5-6 months	
		Last 7-8 months	
		Last 9-10 months	
		Last 11-12 months	
		More than Last 1 year	
A-4	What type of sports you normally participant while participating?	Team sports	
		Individual sports	
A-5	Mention the name of sports you are participating. (You can answer more than one if you need).	Cricket	
		Football	
		Hockey	
		Badminton	
		Basketball	
		Tennis	
		Table Tennis	

		Athletics	
		Others (Mention name of sports)	
<b>B</b>	<b>SELF-ESTEEM SURVEY</b>		
	<p>Rosenberg Self-esteem Scale (1965) was applied to calculate the self-esteem of the students. Rosenberg Self-esteem Scale is a 10-item scale that measures global self-worth by measuring both positive and negative feelings about the self. Items 2, 5, 6, 8, 9 are reverse scored. During calculation “Strongly Disagree” gets 1 point, “Disagree” 2 points, “Agree” 3 points, and “Strongly Agree” 4 points. Sum scores for all ten items. Scores are counted on a continuous scale. Higher scores indicate higher self-esteem.</p>		
B-1	On the whole, I am satisfied with myself.	Strongly Agree	
		Agree	
		Disagree	
		Strongly Disagree	
B-2	At times I think I am no good at all.	Strongly Agree	
		Agree	
		Disagree	
		Strongly Disagree	
B-3	I feel that I have a number of good qualities.	Strongly Agree	
		Agree	
		Disagree	
		Strongly Disagree	
B-4	I am able to do things as well as most other people.	Strongly Agree	
		Agree	
		Disagree	
		Strongly Disagree	
B-5	I feel I do not have much to be proud of.	Strongly Agree	
		Agree	
		Disagree	
		Strongly Disagree	
B-6	I certainly feel useless at times.	Strongly Agree	
		Agree	
		Disagree	
		Strongly Disagree	

B-7	I feel that I'm a person of worth, at least on an equal plane with others.	Strongly Agree	
		Agree	
		Disagree	
		Strongly Disagree	
B-8	I wish I could have more respect for myself.	Strongly Agree	
		Agree	
		Disagree	
		Strongly Disagree	
B-9	All in all, I am inclined to feel that I am a failure.	Strongly Agree	
		Agree	
		Disagree	
		Strongly Disagree	
B-10	I take a positive attitude toward myself.	Strongly Agree	
		Agree	
		Disagree	
		Strongly Disagree	
<b>C</b>	<b>SWB SURVEY</b>		
	Hadley Cantril's Self-Anchoring Striving Scale (1966) was applied to get the SWB of respondents. The scale describes one's life satisfaction with imagination of a ladder with steps numbered from zero at the bottom to ten at the top. The top of the ladder represents the best possible life for the respondents and the bottom of the ladder represents the worst possible life for the respondents.		
C-1	If you imagine your own life, where do you stand from the Worst possible to Best possible life you can imagine. Where 0 indicates worst possible and 10 indicates best possible life.	10 (Best possible life)	
		9	
		8	
		7	
		6	
		5	
		4	
		3	
		2	
		1	
		0 (Worst possible life)	
<b>D</b>	<b>ACADEMIC RESULT</b>		
D-1	What is your Grade in half yearly examination (2016)?	F (0%-32%)	
		D (33%-39%)	
		C (40%-49%)	

		B (50%-59%)	
		A- (60%-69%)	
		A (70%-79%)	
		A+ (80%-100%)	
<b>E</b>	<b>GENERAL INFORMATION</b>		
E-1	What is your gender?	Male	
		Female	
E-2	What is your Class/Grade?	Six	
		Seven	
		Eight	
		Nine	
		Ten	
E-3	What is your age?	Below 10	
		11-12	
		13-14	
		15-16	
		Others	
E-4	What type of family you are staying with?	Single family (consist of father, mother, brother and sister)	
		Combined family (consist of father, mother, brother and sister and grandparents)	
E-5	What is the occupation of your father?	Government Service	
		Private Service	
		Business	
		Unemployed	
		Others	
E-6	What is the occupation of your mother?	Government Service	
		Private Service	
		Business	
		Unemployed	
		Others	
E-7	What is the education background of your father?	Graduation	
		HSC	
		SSC	
		No Education	

E-8	What is the education background of your mother?	Graduation	
		HSC	
		SSC	
		No Education	
E-9	Please mention the socio economic status of your family.	Upper class	
		Upper middle class	
		Middle class	
		Lower middle class	
		Lower class	
E-10	Your Name		
E-11	Name of your School		
<b>End</b>			

국 문 초 록

# 고등학생들의 스포츠 참여와 그들의 자존감, 주관적 행복, 학업 성취도와의 관계:

방글라데시를 중심으로

Mohammad Tanvir Zaman

글로벌스포츠매니지먼트 전공

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스포츠 참여는 학생들의 자 존 감, 주관적 행복 (SWB), 그리고 학업성취도에 기여를 한다. 특히 지속적인 스포츠 참여는 인구밀도가 높은 방글라데시 다카에 위치한 학생들의 성장에 중요한 역할을 한다. 하지만 다카 도시와 다른 지역에 거주하는 특히 고등학생들의 스포츠 참여를 높이기 위해서는 학부모들이 어떤 혜택이 따르는지를 알아야 한다. 스포츠 참여도가 젊은 학생들의 자



존 감, 주관적 행복과 학업 성취도에 미치는 기여도를 대중에게 더 많이 알리면 미래에 학부모와 정책 입안자들이 다카 도시에 스포츠시설 발전에 힘을 쓸 것이다.

본 연구는 방글라데시에 위치한 다카 도시에 있는 고등학생들의 스포츠참여도와 그들의 자 존 감, 주관적 행복, 학업 성취도와의 관계를 규명하였다. 설문지의 질문들은 고등학생들의 스포츠 참여도 레벨, 자 존 감, 주관적 행복, 학업 성취도를 측정하기 위해서 수집되었다. 데이터는 다카 도시의 (N=300 명) 고등학생으로부터 수집하였다. 스포츠 참여도에 관한 주요한 결과는 제법 높은 숫자의 고등학생들이 스포츠에 참여를 하고 있지 않는다는 사실이다. 50%에 가까운 참여자들이 아예 스포츠에 참여를 하지 않던가 일주일에 하루, 이틀 정도 참여를 하였다. 그 외에 참여자들은 방글라데시에서 가장 유명한 크리켓과 축구를 참여하고 있었다. 이와 같은 심층적인 분석을 통해 본 연구는 스포츠 참여가 다카시에 거주하는 고등학생들의 자 존 감, 주관적 행복, 학업 성취도에 긍정적인 영향을 미친다는 것을 발견하였다. 따라서 스포츠 참여도를 높이면 고등학생들의 자 존 감, 주관적 행복, 학업 성취도를 발전시킬 수 있다는 결론을 도출할 수 있다.

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**주요어:** 스포츠 참여, 고등학생, 자 존 감, 주 관적 행복, 학업 성취도

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